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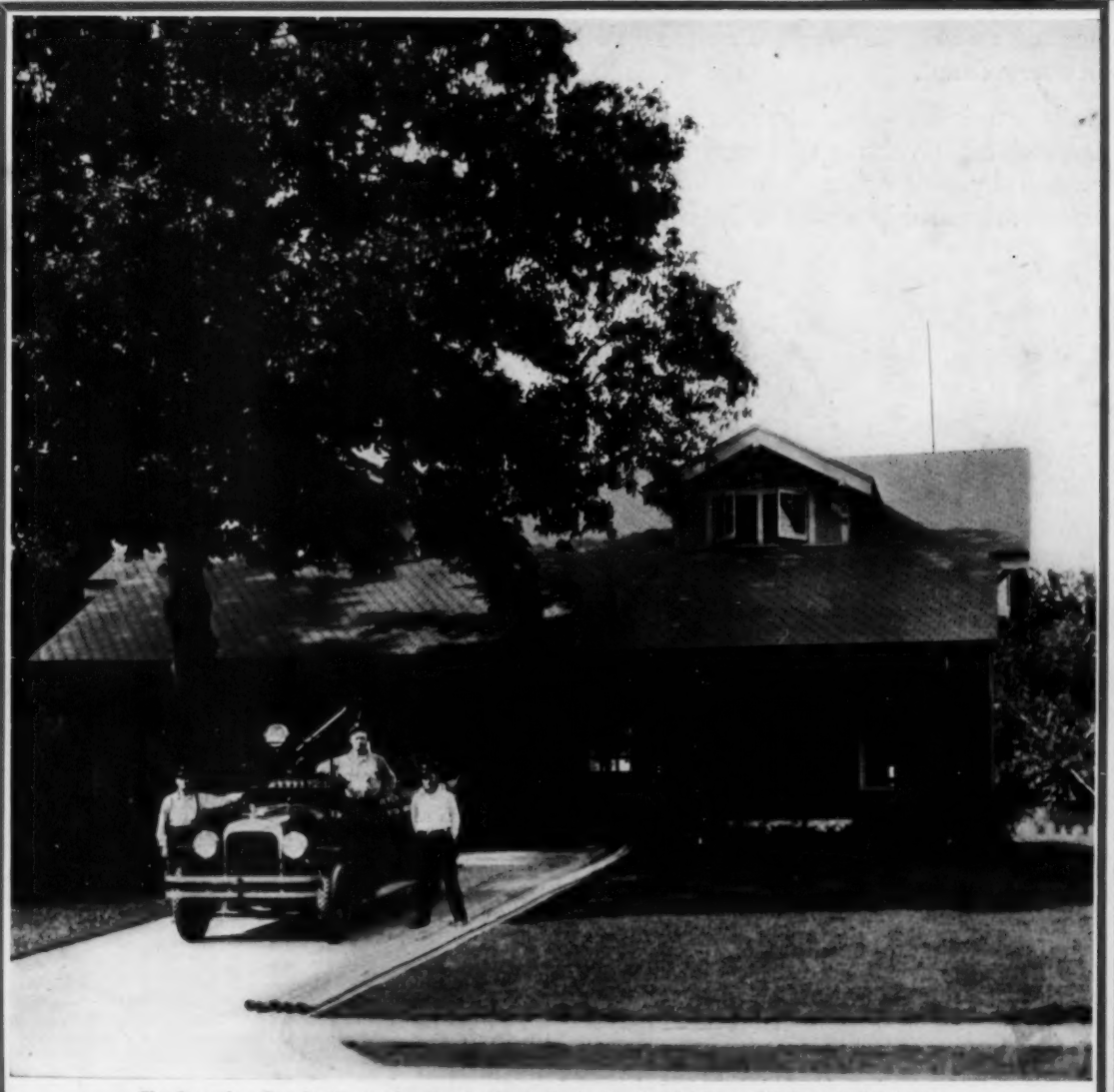
The Journal of the Fire Protection Profession

MAY 13, 1931



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A Consolidation of FIRE AND WATER ENGINEERING *and* THE FIRE ENGINEER

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AS another step toward making FIRE ENGINEERING of even greater value and interest to the fire chief of the smaller community, we are happy to announce a new series of articles on volunteer fire departments to commence in our next issue, May 27.

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¶ If you are a volunteer fire fighter, don't miss any of the coming issues whatever you do. If you are a big city chief, will you please pass the word around to your smaller neighbors?

The Publishers

VOL. LXXXIV No. 10

May 13, 1931

Selling the Fire Department to the Public, by Edward F. Clark 343
The Citizens Must Be Educated to the Necessity of Cooperation in Fire Prevention.

Right of Muicipal Firemen to Receive Compensation for Injuries, by Leo T. Parker 345
Wherever Possible, Courts Are Favorable to the Firemen—Contributory Negligence.

The Round Table 347
Do You Believe Public and Parochial Schools Should Be Equipped With Lighting Rods? Have You Observed Specific Cases Where Buildings Were Saved Because of Lightning Rods? Should the Fire Department Supervise Such Installations or Check on the Work Done?

With the Editor 349
Comments on Current Events and Live Topics by Our Editorial Staff.

Questions and Answers 351
Replies to Questions on All Manner of Subjects on Fire Fighting and Fire Prevention.

Recent Important Fires Specially Reported (Illustrated) 353
River Steamer at Pittsburgh Destroyed in 4-Alarm Fire—Burnings of Two Weeks.

Fire Department Improvements 364
Record of Business Activities in the Fire Protection Field.

False Alarm 366
Humorous Side of the Fire Protection Profession.

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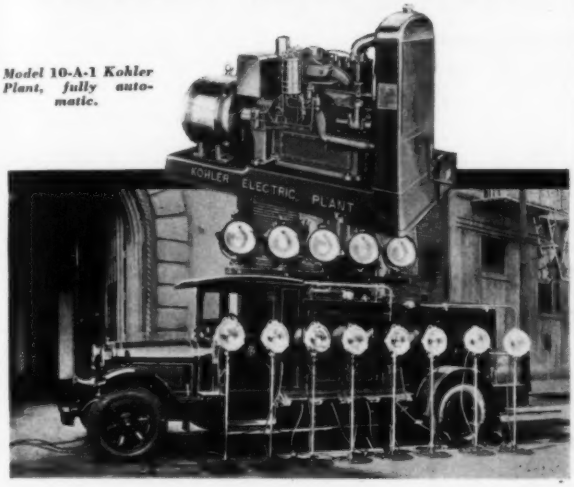

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The Journal of the Fire Protection Profession

VOLUME LXXXIV MAY 13, 1931 NUMBER 10

Selling the Fire Department to the Public

The Citizens Must Be Educated to the Necessity of Cooperation in Fire Prevention—Citizen the Weakest Link

By EDWARD F. CLARK, Fire Department, Rockford, Ill.

Some excellent suggestions are contained in the following article, along the lines of encouraging a spirit of cooperation between the public and the Fire Department, and a closer and more intimate connection in their relations:

SOME time ago, during a discussion about the needs of the fire department, a friend, whose knowledge of the requirements of good business I have reason to respect, said, "If your Fire Department had something it would fare much better. People never think of you except in the case of emergency or as a burdensome, if necessary, public expense."

As I thought over this rather interesting statement, it seemed to me that my friend had not stated the problem quite correctly. Our difficulty is not that we have nothing to sell but rather that we do not try hard enough to sell the thing we have to offer, namely service.

A Fire Department is representative of an investment of many thousands of dollars yearly. This money is provided by the community for the sole purpose of obtaining protection, which it rightly expects will be received in return for the investment. From a standpoint of organized protection from fire, flood, and storm, these expectations are justified to a high degree, proportionally, of course, to the amounts which the community expends for the purpose.

Does the Community Receive Full Value?

The question is, however, does the community receive, for its money, the full value of its investment, or does it—not because of the inefficiency on the part of the department, but rather, because of a lack of knowledge on the part of the members of the community—fail to receive this value, for the reason that the amount of service it is entitled to is not clearly understood?

Consider, for instance, the vast amount of money expended on the fire alarm systems. Consider the time, effort and study that has been put into these systems to bring them up to their present standard of reliability. And consider also the number of times in each department yearly when all the efficiency of these intricate devices have been nullified by the fact that the individual, for whom all of this has been accomplished, has not had sufficient training to operate them correctly.

Again consider the difficulties of the bureaus of inspection and fire prevention. How many times yearly are the inspectors of these departments drawn into arguments and disputes, because the owner of a building or the proprietor of a store cannot be made to see that the inspector is but trying to assist him in protecting his property?

And again how many times have whole communities failed to take advantage of expert and experienced advice and have installed auxiliary fire appliances in their homes and places of business which are not only useless, but have been the cause of many large fires, due to the fact that attempts to use them have delayed the transmittal of the alarm? And why? Solely because the public has not been trained to get the value out of the dollars it spends for fire protection.

Citizen Weak Link in Fire Protection

How then does such a condition affect the Fire Department? To many firemen it means nothing at all. To these men it appears that if the public expects little

"The effort in the education of the Public is not hard to make. It will surprise one, after it has been found out that the department is willing and able to talk about its work, how many invitations will be received to speak before business clubs, parent-teachers' associations, church organizations, scout troops, and the like. It will be found that the desire for information about the Fire Department is acute!"

from the Fire Department, then the department will be in a better position to satisfy it than would be the case if the people were better informed.

Such a belief indicates a lack of foresight and constructive thinking. In the first place the citizen is the weak link in the chain of fire protection. He cannot be eliminated, for on him rests the responsibility of setting in motion all of the wheels that operate the fire fighting force. Through his ability to carry out his part, fires become large or are controlled while small, lives are saved or lost, and through him and the alarm he transmits the Fire Department gains a reputation for efficiency or is held up to scorn and ridicule.

Responsibility of the Citizen

On the citizen, again, rests a part of the responsibility for the efficiency of the department. He buys the apparatus and the supplies; he pays the salaries; he cooperates with the department, according to his understanding, in fighting fires in his property by installing auxiliary fire appliances, by assisting in the removal of fire hazards and by taking a more or less active interest in the department and its welfare.

Whether or not he respects the Fire Department, its officers and men, whether or not he gives it his confidence and co-operation, depends largely on the efficiency of its operations and on the ability of its personnel to instruct him in the things he should know about it and his connection with it. For this reason, if for no other, there should be a selling plan for fire protection training in each department.

No chain is stronger than its weakest link and in order to carry out the mission of the Fire Department these weak links must be made strong. How can this be accomplished? Surely by selling to the public this information and training on the subjects in which it should be interested from the fire protection standpoint.

Ignorance in Fire Protection Matters

Some time ago Rockford held a school for Watchmen. During the course given at this school it was found that fully 80 per cent of the one hundred and fifty men who attended not only did not know how to transmit a fire alarm, but that the majority did not have any definite instruction regarding their action in the event of a fire. Few of them knew how to operate a fire extinguisher; few even knew the location of the shut-off and drain valves of the sprinkler systems that protected their buildings or how these systems should operate. Yet the responsibility for the safe-guarding of property valued at many millions of dollars rested on these men during a large portion of the day and night.

If these conditions exist among the men of this profession, how true the existence of the same conditions must be among other classes of our communities and how remarkable that we are able to co-operate as well as we do! Such a situation can be eliminated only by mass education. Schools must be held, lectures given, fire prevention information and education covering the work of the department and its public relations encouraged.

Work of Education Not Hard to Accomplish

Really the effort is not hard to make. It will surprise one, after it has been found out that the department is willing and able to talk about its work, how many invitations will be received to speak before business clubs, parent-teachers associations, church organizations, scout troops and the like. Everyone likes to know something about the other fellow's business, and partly because of this, and partly because of a natural interest, the desire for information about the Fire Department is very acute.

In preparing programs for fire department schools for civilians, much thought should be given to the value of any subject from the standpoint of co-operation between the Fire Department and the public. For instance, a lecture on Fire Department rules and regulations would not be advisable because of the fact that it is a purely internal administrative matter, which does not affect the average person. On the other hand talks on fire alarm transmission, auxiliary fire appliances, chemical fire hazards, fire prevention, and the reasons and methods of fire department inspections are exceptionally good because they give the public the Fire Department viewpoint on subjects with which they are more or less in contact. Much of the school work should be in the form of demonstrations, using models and actual apparatus, for it will be found that the interest develops when the operation of things can be seen.

Cost of and Returns from the Program

In conclusion, suppose we consider the cost and return from such a program, if carried out yearly by the department. So far as the cost is concerned, it will be very little. Apparatus is at hand or can be borrowed from interested business concerns. Lecturers and instructors can be found among the department's personnel or among professional men in the community. And models for demonstration can be constructed by the men themselves with remarkable success.

The profit from the plan is the reduction in the yearly fire loss; increased confidence from a knowledge of the department and its personnel; willing and intelligent co-operation in the fire department projects, and an understanding of the department's problems and its needs which will be apparent in the appropriations for the department's use. Surely for such results the effort well is worth while.

McEachern Chief of Columbus, Ga.

Monte McEachern has been elected Chief of the Columbus, Ga., Fire Department, to fill the vacancy caused by the death of the late Chief D. B. Copeland.

He joined the Fire Department in October, 1902, and ever since has had a steady rise. He was made captain in 1907 and five years later was promoted to Assistant Chief. When Chief Copeland died recently, the City Manager appointed Mr. McEachern as Acting Chief. On April 6, the City Commissioners elected him Chief of the Department.

W. B. Miller was made First Assistant Chief and W. M. Miles Second Assistant Chief.

Chief Monte McEachern

Arsonists Convicted

Two men, supposed to be members of a large arson ring, were convicted in Philadelphia, Pa., of setting fire to a furniture store. The two men were identified by a policeman as having left the building by way of a side entrance, ten minutes before an explosion had spread the flames to all parts of the store, and the three floors of the building. Two firemen were hurt while fighting this fire.

EDWARD H. SPRANGERS.

Right of Municipal Firemen to Receive

Compensation for Injuries

Wherever Possible, Courts Are Favorable to the Firemen—Contributory Negligence—Disability for Sickness—Proving the Source of Injury

By LEO T. PARKER, Attorney-at-Law

A FEW days ago I received a letter from a well known fire chief, as follows:

"Please give me legal information, with citations of recent higher Court cases, of various circumstances when a municipal fireman can recover compensation or a pension for an injury. Can he recover for sickness or an injury sustained while not attending to his duties?"

Courts Are Favorable

First, it is important to know that the Courts are favorable to firemen who sue to recover compensation or a pension for an injury. And the Courts will decide litigations of this nature in favor of firemen, if it is possible with any degree of fairness to do so.

For instance, in Simmons vs. Pension Commission, 150 Atl. 245, it was shown that a state law provides that any member of a Fire Department who receives permanent disability in the performance of his duty, shall be retired upon a pension.

A municipal employee was seriously injured while performing his regular duties. He was given a leave of absence. Later, believing that he had recovered, he applied for reinstatement. He was informed that there was no opening for him because of his unfit physical condition. Soon afterward he asked to be put on the pension list, and it was contended by certain officials, that he was not entitled to a pension because he was not a member of the department when he applied for the pension. However, the higher Court indicated that he was entitled to a pension, and said:

"It seems to be conceded that he sustained a severe injury in the performance of his duty. . . . "

Generally speaking, a fireman cannot recover for injuries sustained clearly outside the scope of the employment. Yet it is not essential to the right to receive compensation that the injured fireman should have been engaged in his regular work at the particular time the injury was received. In other words, legal employment is not limited to the exact moment when he begins or quits his work. A risk is incident to the employment, for which the fireman is entitled to recover, when it belongs to or is connected with his regular duties. It may be incident to the employment when it is either an ordinary risk directly connected with the employment, or an extraordinary risk which is only indirectly connected therewith.

It, also, is well settled that a fireman must not unnecessarily increase the risk of injury to himself beyond that ordinarily contemplated as a usual or unusual duty of a fireman. In other words, he must not choose an unnecessarily dangerous place for the doing of the act which is claimed to be incident to the employment. Moreover, if a fireman chooses to go to a dangerous place, or perform a dangerous act which his employment does not necessitate, and thus increases a danger of his own choosing altogether outside of any reasonable requirement of his work, such risk is not incident to the employment.

A recent higher Court case, Landon vs. Industrial, 173 N. E. 49, explains the law, as follows:

"An injury must arise out of and in the course of the employment or it must be incident to the employment. . . . An employe is engaged in the course of his employment when the injury occurs within the period of his employment, at a place where he may reasonably be, and while he is reasonably fulfilling the duties of his employment or is engaged in doing something incidental to it. . . . An injury arises out of the employment when there is apparent to the rational mind, upon consideration of all the circumstances, a causal connection between the condition under which the work was required to be performed and the resulting injury."

What Is Accidental Injury?

A review of the compensation laws and regulations discloses that some of them provide compensation when a fireman receives an "injury" in the course of his employment, while others make the foundation of such claim an "accidental injury" or an "injury by accident." In interpreting these various terms the Courts have made an important distinction in the use of these words.

Generally it has been held, where the word "accident" is used, a fireman suffering from a disease is not entitled to compensation and, if the word "injury" is used, and "accident" omitted, a fireman who contracts an occupational disease is entitled to compensation.

Also, in the late case of United States vs. McMichael, 293 Pac. 773, it was shown that a state law provides for "accidental injury." This Court awards of compensation for held that disability from inhaling an excessive amount of gas or dust, resulting in acute bronchitis is not within the law. The Court said:

"Under our act 'injury' is defined to mean 'accidental injury,' and the basis of a claim for compensation must be a casualty occurring without expectation or foresight; occupational diseases, sustained in the course of employment where from the nature of the work such diseases are likely to be contracted, are excluded as a basis of compensation, for an occupational disease is not an accidental disability."

Fireman Obeys Orders

With due regard to the above mentioned settled law, various Courts have held that an injury, sustained while a fireman is in the act of obeying the instructions or orders of a superior "arises out of the scope of the employment."

Moreover, although a fireman is not ordered to perform a dangerous duty, yet if he does so within the scope of his employment, he is not deemed to be contributorily negligent.

For example, in the late case of Smith vs. Twin, 144 Atl. 58, it was disclosed that a fireman was killed when an explosion occurred in a basement into which he had gone to investigate the strong odor of escaping gas.

In holding that the risks assumed by firemen does not bar a recovery of compensation, this Court interpreted the law as follows:

"When there is a legal duty, as here, to perform the act, it is not to be said that performance of the duty is negligence which will bar recovery. . . . It is contemplated that he (fireman) shall fight all fires however caused and run the risk of injury from what may be expected to be encountered in so doing. . . . If it may be said to be within contemplation of his contract of service that a fireman fights a fire

SUBJECTS TREATED IN THIS ARTICLE

Courts Are Favorable to Firemen
What Is Accidental Injury?
Fireman Obeys Orders
Employee Contributory Negligent
Negligent Person Liable for Injury
Disability for Sickness
Source of Injury Provable
City Pension Law Bars Payment from State Funds

whatever the condition of the premises. . . . Hazard of explosion and hazard from the situation in which it took place were not the same."

Employe Contributory Negligent

Certain Courts have held that a municipal employe may be denied the right to recover damages from the city where the injury results from apparent negligence on the part of the employe.

In other words, it is well settled that a fireman, or other city employe, who disregards warnings of danger is contributory negligent, and he is not entitled to recover damages for an injury thus sustained.

For illustration, in City of Jacksonville Beach vs. Jones, 131 So. 369, decided during the past few weeks, a municipal officer was warned by a city employe that a charge of dynamite would be discharged and that he had better "get out of the way." The officer disregarded this warning and was killed. His dependents sued the city for damages, but the Court refused to hold the city liable, saying:

"The evidence shows conclusively that the deceased, Jones, at the time of and before the explosion of the dynamite by the employe of the city, was present and observed what the employe was about to do and was doing; that he had full knowledge of the quantity and the manner in which the dynamite was being used. It shows that he knew the dynamite was about to be discharged, that he knew how and in what manner it would be discharged, and that . . . he was warned by the servant of the city about to discharge the dynamite of the danger, and that he voluntarily disregarded the warning and remained in the vicinity where the dynamite was about to be discharged and was discharged. In this he was negligent, and assumed the risk incident to remaining in the vicinity at such time."

Negligent Person Liable for Injury

Irrespective of how an accident is caused, the negligent party is responsible and liable to the other for injuries sustained. So held a higher Court in the late case of Gauvereau vs. Checker Cab Co., 131 So. 590.

Here it was shown that a fireman of the New Orleans Fire Department filed suit against the Checker Cab Company alleging that when he was riding on the running board of a fire truck it was run into by a taxicab at a street intersection.

The cab company contended that its cab did not strike the fireman but that his injuries were due to the fact that he jumped off of the truck just before the collision, lost his footing, and fell. The company argued that the injury resulted from carelessness of the fireman in jumping off the truck. Notwithstanding this contention the higher Court held the injured fireman entitled to recover $3,500 damages, saying:

"Whether plaintiff (fireman) jumped or was knocked off of the truck by the impact of the collision is unimportant, because we are satisfied from the evidence that if he jumped it was at a time when the collision was imminent and in an effort to avoid injury, consequently the result of his fall was due to the collision. Our appreciation of the record is that the accident was due to the excessive speed of the driver of the cab."

Disability for Sickness

Ordinarily, a municipal fireman is not entitled to recover compensation or a pension for sickness, unless he proves with reasonable certainty that such sickness resulted from performance of his regular duties. The latest higher Court case involving this point of the law is Tripp vs. Pension Commissioners, 271 Pac. 795.

In this case it was shown that a city ordinance provides a pension for any fireman who is physically disabled by reason of sickness caused from the discharge of his duties.

A fireman who was totally and permanently disabled by a disease filed a petition alleging that disease was an after effect of influenza which he had contracted while performing his regular duties as a city fireman. However, since he failed to prove this assertion the higher Court held that he was not entitled to a pension, and said:

"Such a radical departure from ordinary pensioning laws is not to be assumed to be the legislative intent without direct language to that effect. 'Disabled in the service of the city' is properly understood to mean 'disabled by reason of bodily injuries received in, or by reason of sickness caused by the discharge of the duties of such person.'"

Also, in the leading case of State vs. Board, 184 S. W. 929, it was shown that where a fireman was killed while off duty, his widow was not entitled to a pension under the laws which provided for pension to dependents of firemen killed or injured while in the service of the city.

Source of Injury Provable

On the other hand, it is interesting to observe the decision rendered by the higher Court in the late case of Blair vs. Coleraine, 225 N. W. 284.

In this case it was disclosed that a person had for 20 years been a fireman when he had a hemorrhage which caused paralysis. Testimony was introduced showing that the attack had come onto him immediately after he had performed strenuous duties as a fireman. In view of this evidence the Court held the fireman entitled to compensation, saying:

"At the time he responded to the fire alarm, relator was feeling perfectly normal and he had never before had any trouble such as he described or any indication of it. . . . A

(*Continued on page* 359)

Elmira Furniture Warehouse Destroyed

Special equipment was called to fight a fire that destroyed the Kobacker Furniture Company warehouse in Elmira, N. Y. It is believed that the blaze was of incendiary origin.

A telephone call at 5:15 p.m. summoned Engines 1 and 3, Truck 1 and Rescue Squad 1. When the companies arrived, huge billows of smoke were issuing from the three-story

Dense Smoke Issuing from Kobacker Furniture Warehouse

wooden structure, and then the entire building burst into flame. Chief John H. Espey who responded on the first alarm immediately transmitted a special call for Engine 5 and twenty minutes later a call for Engine 4. In the meantime Turrets 1 and 2 had been summoned and placed at vantage points. These turrets each carry a Morse Invincible and a Hart Phillips Deck Pipe, but since hydrants fed from six-inch mains were only available, the full facilities of the Department could not be used.

Smoke for many blocks around was so dense that privately owned automobiles and fire apparatus narrowly averted collisions.

Realizing the losing battle to save the old frame structure, formerly a tobacco warehouse, Chief Espey concentrated on preventing the spread of flames to nearby frame exposures. In this he was successful. A two-story frame dwelling with retail gas station on the first floor, five hundred feet from the burning building, was ignited but the flames were soon extinguished. A wooden shingle roof seven blocks away was set on fire but a pumper from Elmira Heights extinguished it.

At the warehouse fire, four American-LaFrance 750-gallon pumpers furnished streams at 120 to 200 pounds pressure. Turrets carried 1½-inch tips while the mobile lines were provided with 1⅛-inch nozzles. Both platoons of the Department worked for 6½ hours at the fire under the leadership of Chief Espey and Deputy Chiefs Daniel Collins and Charles Spaulding. About six hundred feet of hose were badly scorched and rendered unfit for further service. Fire damage was estimated at $65,000.

Fire Station Opened in Buckhead, Ga.—A new fire station has been opened in Buckhead, Ga.

El Dorado to Have Reserve Unit of Firemen—El Dorado, Ark., will form a reserve fire fighting unit to assist the regular Fire Department.

Rev. Braune Chaplain of Newark, N. J.—Rev. Oscar E. Braune has been appointed Protestant chaplain of the Newark Fire Department to fill the vacancy caused by the death of Rev. Dr. James Clayton Howard who was chaplain for nearly twenty years.

THE ROUND TABLE

For Practical Discussion of Current Fire Department and Fire Management Problems

IGNORANCE results in fear, and wherever fear exists there is lack of reasoning.

It is doubtful if anything today brings about more fear than the phenonema of lightning. In the days of savagery, such electrical discharges were considered as the outward sign of the wrath of the gods.

"The gods are angry," muttered the wise men, and the humble population repeated the remark.

Even in this scientific age when attempts are made to answer all puzzling questions with results from laboratory tests, the first flash of lightning will drive people indoors, cause them to close windows and lower shades. They are similar to the ostrich which believes that by burying its head in the sand, it is safe from all danger.

Tests conducted at the laboratory of the General Electric Company have proven that it is possible to protect objects from lightning. The experiments were carried out in order to find some way of protecting oil tanks from the dangers of lightning. By means of tall posts placed around the tank, the electrical charge is drawn from the tank to the posts which are grounded and which if struck would cause no real damage.

With buildings, in order to have some object higher than the structure itself to draw the charge, pointed rods are placed on the roof. Copper wires are then run from the rods to a well grounded connection. The rods are termed lightning protectors.

Such a system has been in existence for some time. However, during the early days of its history when lightning was not a subject as well understood as it is today, rods of very artistic design were placed on the building and were not properly grounded. The rods performed their function. They attracted the immediate electrical charges. But since the rods were not properly grounded, the tremendous voltage instead of being guided to a place where it may be dissipated harmlessly, was left to cause damage to the building. Lightning rods developed into a standing joke.

With an increase of knowledge concerning Nature's most feared phenonoma, the lightning rod has lost much of its artistic design. Instead, attempts are made to secure a faultless ground and to secure copper wire heavy enough to conduct the electrical charge from the roof to the earth.

Today, a flash of bluish light in the heavens does not mean that the gods are angry. Many find keen enjoyment in watching the beautiful patterns made by the electrical discharge as it streaks across the darkened sky.

In the box on this page is the problem that is considered in this issue. In the box on the following page is the question that will be treated in the next issue. Should you have some comments that you would like to add to the next discussion, you are invited to write to the "Round Table Editor," FIRE ENGINEERING, 24 W. 40th Street, New York, N. Y.

HERE IS THE PROBLEM

Do you believe public and parochial schools should be equipped with lightning rods?

Have you observed specific cases where buildings were saved because of lightning rods?

Should the Fire Department supervise such installations or check on the work done?

Discussion of the Question

Fire chiefs admit that their experience with lightning rods is rather limited. A few have reported cases where such protection has either cut down the resulting damage or has avoided the customary losses. The replies follow:

Forest Craig, Chief, Kokomo, Ind.: I believe all public and parochial schools should be equipped with lightning rods.

I have observed buildings equipped with lightning rods, that had been struck by lightning and the damage done was nominal. There is no doubt in my mind if these buildings had not been protected with lightning rods the damage done by lightning would have been much greater.

There should be regulations, I believe, in the installation of lightning rods on all school buildings, this to be under the city electrical department. The work when completed should be inspected by the electrical inspector.

Henry R. Taft, Chief, Norwich, Conn.: I believe that not only public or parochial schools should be equipped with lightning rods, but all buildings should be equipped with them as they are a wonderful protection to any building against lightning when properly installed.

I have never observed any specific cases where buildings have been saved from lightning rods, but if lightning rod equipment be properly installed, the rods being properly grounded to a good ground, they certainly will protect the building from lightning.

During a severe electric storm about a year ago we received a call from one of our citizens that the house had been struck by lightning, setting it afire. The department responded and upon arrival at the fire made a quick search of the building trying to locate just about where the fire was, but the men could not find any fire. Further investigation revealed that the lightning struck an aerial wire used as an antenna to a radio set which was fastened to a chimney. The lightning took its path to the ground over the aerial which was properly grounded to the water pipe in the cellar. Strange to say we found the ground wire of the radio set parallel in the same eyelets that carried the ground wire of the telephone. The insulation was found burning on both the radio and telephone ground wires. Had it not been for the aerial carrying the bolt of lightning to the ground, it might have been the means of doing additional damage.

The account about the aerial explains the principle

of the lightning rod, and how it would be a protection to a building. Lightning is a giant electric arch which performs some queer pranks.

I think the Fire Marshal or someone connected with the Fire Department ought to inspect such an installation to see that the work has been properly done.

H. E. Nissen, Chief, Winston-Salem, N. C.: I do not assume to be an authority on lightning rods but I am of the opinion that they are but little, if any protection to buildings of any character. I have never observed the freaks of lightning to any extent, except in a community where there were numerous aerial or overhead wires which appear to attract and absorb many flashes.

I have never known of a building which was saved by a lightning rod.

If a Fire Department head is convinced that a lightning rod is a protection to a building, he should see that same is properly grounded and attachment brackets insulated.

Giles Dow, Chief, Stoughton, Wis.: The state building code does not require lightning rods on school buildings, and ours do not carry them.

I have never seen a rodded building struck but as we have had only a few cases of lightning damage, my experience has been limited.

An improperly attached rod is a menace, not a protection, and I believe that the Fire Department should check them when they are placed on school houses.

Chris W. Noll, Chief, Poughkeepsie, N. Y.: I personally believe all schools, public, private or parochial, as well as all churches and places of public meeting should be protected with lightning rods. I observed from statistics that the losses in western parts of the United States were greatly lessened by their installation. I am recommending their use wherever possible, and believe the work should be checked by the Fire Department to insure proper installation.

A. B. Horney, Chief, High Point, N. C.: I believe that all buildings should be grounded in some way, if not by lightning rods, then by copper wires connected with copper rods driven in the ground at least ten feet.

I have never observed a case where a building had been saved with lightning rods, but I had a dwelling fire last summer that was damaged to the extent of $13,000 because it was not grounded in some manner.

The installation should be under the supervision of the Electrical Department.

Jos. Fifarek, Chief, Traverse City, Mich.: In the last twenty-six years I have never heard of any school in our City being struck by lightning due to the fact that our City is pretty well covered with power lines and telephone wires which protect the City.

But for small towns where there are but few wires, schools should be equipped with lightning rods.

Fire Department members should be well versed in the installation of lightning rods so they may supervise or check up the installations.

R. Chrisman, Chief, Roswell, N. Mex.: I believe in certain communities where lightning is bad, school houses should be equipped with lightning arresters. We have no record of a house being struck by lightning in or near Roswell, N. M., for thirty years or more.

It is my opinion that the Fire Department or the electrical inspector should supervise and inspect all such installations.

Clive K. Dall, Chief, Delaware, Ohio: I believe all buildings that stand out in the open such as school houses and churches should be rodded.

I know of an instance where a barn was struck twice in the same year, but is completely rodded. Very little damage was done, while two buildings on neighboring farms were not rodded and when struck by lightning burnt to the ground.

I think that any fire chief who makes a study of his work is fully competent to inspect and supervise the installation on any building that needs to be rodded.

D. A. Kincade, Chief, Independence, Mo.: I do believe the schools should be equipped with lightning rods and the work should be done under the supervision of the architect.

Otto Hackborth, Chief, Marinette, Wis.: Public and parochial schools, I believe, should be equipped with lightning rods in small towns and rural districts, but not necessarily in the cities.

I have never observed a case where a building was saved because of lightning rods.

The installation of such rods should be under the supervision of the Fire Department, or checked over by some very responsible person.

C. W. King, Chief, Ft. Lauderdale, Fla.: I believe that all schools or public buildings should be grounded for safety and the installation supervised by the fire and building inspector.

W. C. Blois, Chief, Westboro, Mass.: With the type of school buildings which we have, I do not believe that lightning rods are necessary.

I have never known where a building has been saved by the lightning rod.

I do not believe that the Fire Department should supervise the installation of these rods as I believe licensed electricians could do this work just as well.

Henry Hanson, Chief, Rhinelander, Wis.: I believe public and parochial schools should be equipped with lightning rods, and when such have been completed should be supervised by the Fire Department. When the lightning rods have been well grounded, buildings were saved because of the installation.

Jack M. Byers, Chief, Hagerstown, Md.: Hagerstown is protected enough by outside wiring to care for the protection of schools and therefore we do not employ lightning rods. But where they are used, the Fire Department should check the work done. I have never observed specific cases where buildings were saved because of lightning rods.

Chief, Mount Carmel, Pa.: Schools should be equipped with lightning rods if they actually protect the building from lightning, though I have never witnessed nor observed any specific cases where buildings were saved because of the lightning rods. I believe that if the Fire Department supervises the installation of this work, they should be paid for it.

E. G. Beckert, Chief, W. New York, N. J.: I believe that lightning will hit its "mark" irrespective of any and all protection that might be installed.

Ed. Dubois, Chief, Monroe, Mich.: Lightning rods should be installed on school buildings and the installation of these should be checked and supervised by the fire department. I have observed cases where buildings were saved because of the lightning rod.

E. E. Chase, Chief, Lynn, Mass.: I do not believe schools should be equipped with lightning rods in preference to other buildings, and I do not believe that the Fire Department should supervise the installation of the lightning rods. I have never observed a specific case of the lightning rods being the means of a building being saved.

R. C. Robertson, Chief, N. Attleborough, Mass.: We have a code for building inspection and fire hazard in all of our old and new school buildings. But never look or ask about lightning rods!

All of our school fires were from other causes.

I do believe they are a good thing, give the schools all the protection possible. If rods are placed on the buildings, they are sure of that protection.

I think it should be up to the Fire Department to ask for that protection.

* * *

ANSWER TO PREVIOUS QUESTION

The following is in reply to a question on whether the Fire Department illuminates fire grounds at night, and if the practice has resulted in faster operations:

Allen F. Payson, Chief, Camden, Me.: It is my opinion that

(*Continued on page* 359)

HERE IS THE PROBLEM FOR THE NEXT ISSUE

By what method is it advisable to remove 2½-inch hose from a triple combination pumper—nozzle first or hydrant end first?

Which would be the most efficient for volunteer fire companies?

How do you stretch your line—from the fire to the hydrant or from the hydrant to the fire? Why?

With the Editor

Business Men Protest on Bad Fire Situation

There is a certain town of some 5,000 population in which the fire protection situation is so bad that the business men of the municipality have taken joint action and submitted a memorial to the Village Council, requesting that body to take immediate steps to improve the fire-fighting facilities.

There have been several quite serious fires in this village of late, which have, it is claimed, emphasized the inability of the present equipment to handle the situation, and in view of the peril that might ensue should the municipality be visited by a conflagration, the business men felt that it was time for action to improve matters in this respect.

It seems well nigh incredible that in these days of preparedness in matters of fire prevention and fire fighting there should be a town the size of the one in question without adequate provision in such matters. And yet, were an investigation of the matter made, it is quite probable that this village would by no means stand alone in its carelessness in neglecting to provide facilities for properly protecting its citizens against the dangers of fire.

It is a notorious fact that the governing bodies of municipalities are often lax in this respect. When the question of reducing the village budget comes up—unbelievable as it may seem—there is a tendency among City Council members to cast eyes first upon the Fire Department appropriation to see if some items cannot be lopped off, without causing a storm of protest from the citizens who understand such matters or the members of Fire Department themselves.

It need hardly be pointed out that such a policy has distinctly the nature of a boomerang. Parsimony in the matter of fire protection is apt to prove an expensive form of economy!

The Hazard of the Bonfire

This is the story of a small boy and a match which came close to causing the destruction of an entire neighborhood. On the morning of April 18 last a youngster in the town of Fairfield, Conn., innocently tossed a match into a patch of grass. The grass burned until it reached a five-car wooden garage located between a three-story frame dwelling house on one side and a two-story frame house in the opposite direction.

Within a few moments after the fire had eaten its way to the garage, this building was a mass of flames and before the blaze was subdued it had burned parts of the two dwelling houses and made five families homeless. Needless to say, all three cars in the garage at the time were destroyed. For a time the blaze threatened to do even more extensive damage, and the Fairfield department was forced to send to Bridgeport for assistance.

The small boy meant no harm with his match; nobody does! But this fire, like hundreds of others, was the price for ignoring the repeated warnings of the Fire Wardens of Connecticut, as well as similar officials in other states, that grass fires must not be started at this period of the year, under any conditions.

The countryside at present is like tinder. A spark may start a tiny blaze. Spring breezes will quickly fan it into fury. Those who think that they can watch their bonfires and keep them under control are risking possible disaster, not only to their own property, but to that of their neighbors.

Yet, despite all warnings, and despite publication of the fact that many state and municipal authorities are withdrawing all permits for burning brush or building fires in the open, serious grass fires such as the one that did so much damage in Fairfield, and forest fires which burn over hundreds of acres of trees, are reported every day in the news.

Occurrences of this nature seem to point to the necessity for more drastic action against these offenders. An arrest or two, with the accompaniment of a substantial fine for endangering the property of their neighbors, and even the city or town in which they live, might have the effect of bringing such careless folk to their senses!

The Fire Drill and Actual Fire

Demonstration of the value of the fire drill in schools has again been received through a blaze in a Long Island, N. Y., village recently. In this particular case, a pupil in a frame high school building noticed smoke coming from the walls and had the presence of mind to sound the fire drill signal.

The result was that the teachers and pupils, numbering over seventy, marched calmly out of the structure and to the street, while the fire, spreading with great rapidity, involved the whole building in a very short space of time.

This example of "fire drill consciousness" is only another case which proves that the habit of quiet and orderly exit at the signal for the fire drill frequently exercised by teachers and students makes such an impression on the mind that in time of great stress and danger incident to an actual fire, the occupants of the school building will instinctively move out of it without any sign of panic.

The value of this teaching in connection with schools

cannot be overestimated. If any chief knows of a school —public or private—in his city or town which neglects this most important matter of fire drills he should make it his business to suggest to the authorities in charge that such drills be at once inaugurated and followed out systematically. Such action on his part may result in the saving of life or preventing of serious injury to the pupils of such schools, in the event of a serious fire breaking out.

NEW ENGLAND FIRE CHIEFS ARRANGE CONVENTION PROGRAM

Joint Meeting of Board of Directors and Exhibit Committee Held—Several Well-Known Speakers to be Invited to Take Part

By HARRY BELKNAP

A JOINT meeting of the Board of Directors and Exhibit Committee of the New England Association of Fire Chiefs was held at the Parker House in Boston on April 15 to discuss plans for the coming convention in Boston. A tentative program was drawn up and it was voted to invite Acting Chief Thomas F. Dougherty, of New York; Chief John M. Evans, of New Orleans; Fire Marshal Brophy, of New York; Fred Shepperd, Managing Editor of FIRE ENGINEERING; John S. Caldwell, of the New England Insurance Exchange; and Chief Joseph L. Sullivan, of Utica, N. Y., President of the International Association of Fire Chiefs, to attend the convention and deliver addresses or read papers.

Chief Selden R. Allen, President, New England Chiefs' Association

The following program was adopted for the convention: Tuesday, June 23, a.m.

Registration, Hotel Copley-Plaza. 2 p.m., Opening of Convention by President Allen in Paul Revere Hall, Mechanics' Building. Addresses of Welcome. Response to Addresses. Annual Memorial Exercises. 7 p. m., Demonstration by Boston Fire Department, Dorchester Avenue and Fort Point Channel.

Wednesday, June 24, 10 a. m. Business Session, Paul Revere Hall. 2 p. m. Business Session, Paul Revere Hall. 8 p. m. Round Table Discussion, Smoker and Entertainment, Paul Revere Hall.

Thursday, June 25, Exhibits and Demonstrations. Short Business Session, 10 a. m., Paul Revere Hall. Banquet in evening.

Friday, June 26, 10 a. m. Business Session and Election of Officers, Paul Revere Hall.

Automobile trips for the ladies to points of historic interest will be arranged.

The meeting was attended by Chief Selden R. Allen, Brookline, Mass., President; Chief John W. O'Hearn, Watertown, Mass., Secretary-Treasurer; Chief Daniel B. Tierney, Arlington, Mass., Chairman of Exhibit Committee; Chief Alfred H. Koltonski, Rutland, Vt., Director; Chief James M. Casey, Cambridge, Mass., Director; Chief John S. Pachl, Annex F. D., New Haven, Conn., Director; Harry Belknap, Boston, Press Representative; George F. Cobb, Boston, Traffic Manager; Chief Henry A. Fox, Boston; Supt. Edward E. Williamson, Maintenance Division, Boston Fire Department, and John Campbell, of the Exhibit Committee.

Mt. Blanchard, O., May Have Apparatus—Mt. Blanchard, Ohio, may purchase apparatus for the protection of rural property.

THE VOLUNTEER FIRE DEPARTMENT

Starting with the May 27 issue and continuing in each issue thereafter until the entire series has been printed, FIRE ENGINEERING will publish a series of articles written solely for the volunteer Fire Chief and members of a volunteer Fire Department.

The series will be complete, covering all important topics of interest to officers of a volunteer Fire Department—raising money for apparatus, the type of apparatus and equipment to purchase, organization of a Fire Department, suggested constitution and by-laws, personal liability of firemen, fire station design, out of town runs, care of fire hose, drills, tools and their use, fire extinguishing, etc.

The articles will present the latest ideas on successfully operating a volunteer Fire Department.

Chief Beckerle 50 Years in Service

Chief Peter Beckerle, of Danbury, Conn., among the best known fire fighters in New England, on May 1 rounded out fifty years as a member of the Danbury Department and fifteen years as Chief. During the half century that he has served as a volunteer fireman and as a member of the paid department, Chief Beckerle has not missed a single fire that has occurred in his city. He has also assisted in combatting fires in Waterbury, New Milford and Bethel.

Chief Peter Beckerle

Chief Beckerle entered the Danbury Fire Department as a volunteer fireman on May 1, 1881. His first duty was as foreman of the then new Beckerle & Company Hose Company, named after a cousin. He remained as foreman of that company until 1893 when he was named Assistant Chief of the Department.

On May 1, 1916, Chief Beckerle was named as head of the department, succeeding the late Chief Thomas A. Lounsbury, who was placed on the pension list. Chief Beckerle served as a member of the volunteer branch for twelve years and has been a member of the paid department for thirty-eight years. Under his direction the Danbury Department has become one of the most efficient in the state of Connecticut and was one of the first departments to become completely motorized. The National Board of Fire Underwriters has complimented Chief Beckerle many times for his efficiency and splendid record.

In 1916 the Danbury Fire Department numbered but twelve paid men. One of the most forward steps taken by the veteran Chief was the installation of the two-platoon system, which replaced the old 24-hour system. Chief Beckerle has also been instrumental in securing four wage increases for the department, placing his men on an equal basis with other departments in the state.

Soon after becoming department head in 1916, he installed a modern system of fire prevention. It was Chief Beckerle who several years ago gave the city of Danbury its first modern building code. Under its provisions, the Chief, as Fire Marshal, has supervised the construction work and has made it compulsory to erect fireproof buildings in the business section and in congested areas. Records of all building work in Danbury are kept by Chief Beckerle.

For many years Chief Beckerle has served as unofficial weather observer for the city and has been the only one who had any weather records of any kind. The United States Weather Bureau recently recognized Chief Beckerle's efficiency as an observer and named him as official weather observer of Danbury. Modern equipment will soon be erected in the spacious yard of Chief Beckerle's home on New street by the weather bureau.

THOMAS F. MAGNER.

Questions and Answers

NOTE—Readers are invited to send in questions, which will be answered in the order received. Names are omitted from questions unless otherwise specified

Pressure on Lines From Centrifugal Pumps

To the Editor:

Will you please give me the following information regarding the layout of two lines of hose from a 750-gallon Seagrave pumper, centrifugal action, pump pressure 150 pounds on engine gauge. The question is: If one line is shut down will the pressure on the other line be such as to cause a dangerous situation.

I maintain the following: One line can be shut down while the difference in pressure on the other line is seven or eight pounds, as this truck is controlled by a governor which I say automatically controls the extra pressure.

The others say the following is the case: That shutting off one line results in doubling the pressure on the other, thereby making it impossible for the men holding the nozzle to control the line.

I would appreciate your comments as to which is the correct statement.

D. W.

Answer: The governor on the centrifugal pump maintains an engine pressure quite constant irrespective of the load (within capacity limits) on the pump. If the pumper is supplying two lines and one of them is suddenly shut off, there may be a slight increase in pressure but it will not be serious.

There would be no possibility of the pressure suddenly jumping up to twice as much, when one line was shut off, for such would require at least a percentage increase in pump speed equal to the percentage increase of pressure, and such increase would not be secured without opening the throttle, or "stepping on the gas." With a centrifugal pump, all lines can be shut off and the pressure within the pump housing will be increased but slightly. Upon opening the lines again, the pumper will pick up the load and deliver equal pressures on both lines, assuming the lines are identical and the nozzle sizes are the same.

Area of Bresnan Nozzle

To the Editor:

The boys in the fire house would be very appreciative of your trouble if you would answer the following question: To what size nozzle does a Bresnan distributor compare—first in diameter, and second, in area?

From figures given below it is apparent that in the old way of finding the nearest size nozzle, the diameter of the 1⅝" nozzle comes nearest to the area of the Bresnan, without using .7854 to bring the diameter to the area required.

Our calculations are as follows: There are six ½" outlets and three ¾" outlets in a Bresnan distributor. To what diameter nozzle is this distributor equivalent? Squaring the ¾" diameter we get .5625 and multiplying by three, the number of outlets of this diameter, we get 1.6875.

Squaring the diameter of the ½" nozzle we get .25, and multiplying by six, the number of ½" outlets, we get 1.5.

Adding these two products together, the result is 3.1875, and taking the square root, we find it to be 1.78. A nozzle of 1.78 inches diameter comes nearest to a 1¾" nozzle.

Second solution: Find the area of all of the orifices combined.

As before we square the diameter of each nozzle, and multiply by .7854, to get the actual area of the nozzle. Then we multiply by the number of each particular size nozzle in the Bresnan distributor and find the total area.

.75 squared gives .5625.

.5625 x .7854 = .4417875, which, multiplied by three, gives us 1.3253625.

Employing the same process with the ½" nozzle we get the area of the six ½" nozzles to be 1.1781 square inches.

Adding these two areas together the result is 2.50346251, which is the combined area of all of the outlets of the Bresnan Distributor. Then abstract the square root of this last figure and the result is 1.58 which is the area of the Bresnan orifices. This comes nearest to being 1.62, which is the area of a 1¾" nozzle. The area of a 1¾" nozzle is found by multiplying 1¾ by itself, and the product by .7854, giving us 1.6198865 square inches.

A 1⅝" nozzle has a diameter of 1.625 inches (in decimals). The area of this nozzle is equal to 1.625 x 1.625 x .7854, giving us 1.32 square inches. The area of a 1⅝" nozzle is usually compared to the area of the outlet of a Bresnan distributor, but from the above figures it is evident that this area is considerably less than the total area of outlets of the Bresnan distributor.

Cordially yours,

S. A.

Answer: (a) In the first place it should be pointed out that there are quite a variety of Bresnan distributors on the market. Those having smaller outlets naturally will have a smaller total area and must therefore be compared to a smaller nozzle than those having larger outlets. That is why some Bresnan distributors are compared to a 1¾" nozzle while others are compared to a 1⅝" nozzle.

The first part of your solution is correct but two errors have entered into the second portion. In solving for the area of a 1¾" nozzle you secure 1.6198865 square inches whereas it is approximately 2.41 square inches.

Furthermore, when you found the total area of the outlets of the Bresnan distributor in the second part of your question, you abstracted the square root of the total area and secured thereby 1.58.

This is incorrect. After you have secured the total area which you found to be 2.50346251, this is the area you must compare to the area of a 1¾" nozzle. It compares quite closely as you will notice.

Otherwise your comparisons are satisfactory.

Ignition of Ether

To the Editor:

Will you please give me the following information. Recently we had an ether fire in our chemistry building. It seems as though the janitor was syphoning ether from a fifty-gallon metal drum into glass jugs, the method they have for syphoning is glass tubes with rubber connections and one hundred pounds of air

pressure. The ether was stored in a standard fire-proof vault. I claim that it was set afire by static. Any information you can furnish me will be appreciated.

Will you also furnish me the information on how much more powerful ether is than gasoline, naphtha or benzol?

H. A. J.

Answer: The ignition of the ether was probably due to static electricity generated through the friction of the ether in the rubber tubing through which it flowed.

Many gasoline fires have originated from the same source—gasoline flowing through hose generating static electricity, and subsequent jumping of spark from the metal nozzle on the hose to metal gasoline container. As to which is the more powerful of the several substances you mention, it is hard to say. However, ether would probably prove the most troublesome because of its greater volatility. In other words, it vaporizes much more readily and thus creates an explosion hazard more rapidly than do the other materials. Of course, there are several different grades of gasoline, one of which approaches ether in its high volatility. This is "casing-head" gasoline.

Program of New Mexico Fire College

The ninth annual convention of the New Mexico Firemen's Association and the Second Annual Fire College will be held in Clovis, N. M., June 3-5. The fire station, City Hall, will be the convention headquarters. Business sessions will be held in the high school auditorium. The full program follows:

Wednesday, June 3—Morning Session

9:00 Registration of members. (All members, associate members and visitors will register with the Secretary at Convention Headquarters. All dues must be paid for the current year before being entitled to recognition on convention floor, and the privileges of the convention.) **Registration Fee....$2.00.**
9:30 Call to Order—Chief P. D. Miller, President. Roll Call.
9:45 Address of Welcome—Lieutenant Governor A. W. Hockenhull.
10:00 Response—Chief P. D. Miller, President.
10:15 Reading of the minutes of the previous meeting and report of the Secretary-Treasurer.—T. A. Rosenwald, Secretary-Treasurer.
10:30 Appointment of Special committees.
11:00 Address "The Fire College," Dean R. S. Rockwood, University of New Mexico, Director of Fire College.
12:00 Lunch.

Afternoon Session

1:00 Parade.
2:00 Ladders and Drill Tower Evolutions, Group 1, Chief Harry K. Rogers, Western Actuarial Bureau, Chicago, Ill.
2:00 Fire Department Hydraulics, Group 2, Col. Clarence Goldsmith, Asst. Chief Engineer, National Board of Fire Underwriters, Chicago, Ill.

Evening Session

8:00 First Aid—Chief Harry K. Rogers, Western Actuarial Bureau, Chicago, Ill., and Fred H. Cushing, Representative, Mine Safety Appliances Co., El Paso, Texas.

Thursday, June 4—Morning Session.

9:00 Address, "Industrial Plant Fire Protection," Chief J. E. Wickham, A. T. & S. F. Ry. Co., Albuquerque, N. M.
9:30 Questions and discussion.
9:30 True and False Test—Chief Harry K. Rogers, Western Actuarial Bureau, Chicago, Ill.
12:00 Lunch.

Afternoon Session

2:00 Ladder and Drill Tower Evolutions, Group 2, Chief Harry K. Rogers, Western Acturial Bureau, Chicago, Ill.
2:00 Fire Department Hydraulics, Group 1, Col. Clarence Goldsmith, Asst. Chief Engineer, National Board of Fire Underwriters, Chicago, Ill.
5:00 Water polo contest.

Evening Session

7:00 Banquet at the Methodist Church.

Friday, June 5—Morning Session.

9:00 Address "Investigation of Fires," H. P. Ruthenberg, Special Agent, Arson Bureau, National Board of Fire Underwriters.
Questions and discussion.
10:00 Motion Picture.
Address and demonstration, "Salvage Operations," Chief F. J. Spillane, Denver Fire Dept., Denver, Colo.
12:00 Lunch.

Afternoon Session.

2:00 Question box and discussion.
3:00 Awarding of Certificates—Dean R. S. Rockwood, University of New Mexico, Director of Fire College, Albuquerque, N. M.
3:50 Report of Standing Committees.
3:45 Report of Special Committees.
4:00 Unfinished business.
4:30 Nomination and election of officers.
5:00 Selection of next meeting place.
5:15 New Business.
5:30 Appointment of standing committees. Adjournment.

Evening.

9:00 Dance.

Power Assistant Chief of Boston

The appointment of Deputy Chief Henry J. Power as Assistant Chief of the Boston Fire Department has been approved by the Civil Service Commission.

Assistant Chief Henry J. Power, Boston

Since last June, Chief Power has been serving as Assistant Chief, but his status was not officially recognized by the Civil Service Commission and his pay was held up pending a decision as to whether or not a competitive examination should be held for the position.

Mayor Curley and Fire Commissioner Edward F. McLaughlin held that the position was an appointive one in view of the fact that Chief Sennott and Chief Fox had both held the position by appointment of the Mayor without taking an examination.

When the position was created by the late Chief John O. Taber, who named Sennott as Assistant Chief, there was no salary advance over that of the Deputy Chiefs, but later an increase of $500 per annum was granted. HARRY BELKNAP.

Westchester Chiefs to Hold Dinner

The second annual meeting and dinner of the Fire Chiefs' Emergency Plan of Westchester County, N. Y., is to be held at the Elks' Lodge, 58 Hamilton Avenue, White Plains, N. Y., on the evening of Thursday, May 21. The election of officers for the ensuing year will take place on this occasion. A large attendance of the Chiefs of the county is expected.

Fire House to be Erected in Washington, D. C.—The Commissioners of Washington, D. C., have appropriated $15,000 for the construction of a fire station at Rhode Island Avenue and Brentwood Road, Northeast.

Houston May Erect New Station—Houston, Tex., is considering the erection of a new fire station at Decatur Avenue and Henderson Street. It is planned to erect other stations later in the year.

THE COVER ILLUSTRATION

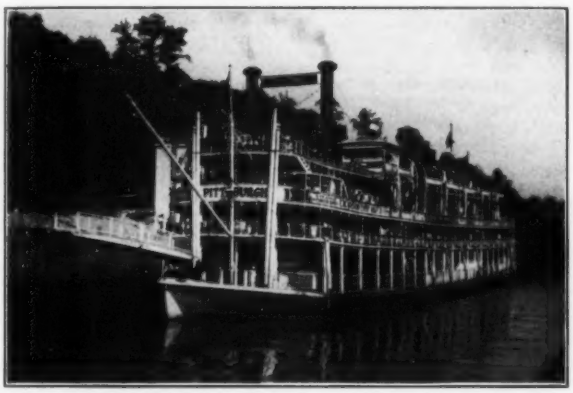
Strange as it may seem, although the Fire Department is very much appreciated in time of fire or in case of an emergency, no one desires to have fire houses as immediate neighbors. For years, fire stations were ugly buildings put together to furnish some protection to the apparatus and the men. Today it is often difficult to distinguish a fire house from some of the artistically designed homes in the neighborhood. The grounds are well landscaped and even the door of the apparatus room is altered in appearance. The station illustrated houses Engine Company No. 6, Decatur, Ill., and the house corresponds with the architecture of the neighborhood.

RIVER STEAMER AT PITTSBURGH DESTROYED IN 4-ALARM FIRE

Explosion Spread Flames Over Entire Boat—Long Lines Were Necessary—Intense Heat Set Fire to Nearby Craft and Buildings

By WILLIAM E. PATTERSON

ONE of the hottest and quickest burning fires that has visited Pittsburgh in many years, completely destroyed the large five-deck excursion steamer "Greater Pittsburgh," the largest and finest vessel of its kind, plying the Monongahela and Ohio Rivers, between Pittsburgh and Cincinnati. The steamer was tied up at the foot of Page Street, North Side, the winter quarters of the boat. The fire burnt the large vessel down to the water's edge, when the flaming hull slowly settled to the bottom of the river in approximately thirteen feet of water, extinguishing the fire with



Steamer "Greater Pittsburgh," Formerly the "Homer Smith," Before It Was Destroyed

the exceptions of a few timbers and studding of the superstructure that extended above the water line.

Sparks and burning fire brands were carried by the wind over a large area of the North Side, some falling on the outer end of Perrysville Avenue, a distance of over three miles from the fire. The intense glare in the sky made the immediate territory around the burning vessel as bright as day. It was plainly visible for miles, resulting in a large number of telephone calls at Fire Alarm Headquarters and newspaper offices from outlying districts and surrounding boroughs, inquiring for the location of the fire.

Heat from the burning vessel, built entirely of wood and dry as tinder, became so intense as the flames gained headway, that firemen could not get within two-hundred feet of the fire. Ties of railroad tracks, running along the river front at this distance were ignited, and nearby warehouses on the river shore were scorched and blistered by the intense heat.

A large wharf boat, the super-structure of which was frame and iron clad construction, moored between the burning boat and the shore, was also completely destroyed. A number of sand and gravel barges owned by the McCready-Rodgers Company, were more or less damaged by the flames. A large towboat moored at the upper end of the landing, approximately one thousand feet above the burning vessel was set afire by the flying sparks. It was quickly extinguished by firemen.

Forty-five sand and gravel barges moored at the landing were removed to safety by two towboats.

The first alarm was sounded at 7:42 p.m. When Engine Companies No. 41, 44 and 47 and Truck Company No. 47, arrived on the scene in command of Battalion Chief Daniel Jones of the Seventh Battalion, the great vessel was a mass of flames from the large wheel at the stern end, to approximately midway between the stern and forward end of the boat.

Battalion Chief Jones, as soon as he arrived on the scene turned in the second alarm at 7:47 p.m., followed by the third at 7:52 p.m., and the fourth at 8:12.

On his way back to the burning vessel from the fire box, after sending in the second alarm, a terrific explosion took place aboard the vessel and the entire boat became involved. Within the short period of one hour, the flames had done their work, and the "Greater Pittsburgh" had settled to the bottom of the Ohio River, a complete wreck and total loss.

Firemen from the first alarm companies, after stretching every foot of hose they had on their apparatus, through private driveways and properties, across a number of railroad tracks, down over the river shore and out over a fleet of barges, in order to reach the fire, had to drop their lines and run for their lives when the explosion took place aboard the vessel. A number of firemen nearly fell into the river, as they jumped from barge to barge over open spaces of water between some of the barges, before reaching the shore.

Two firemen, each with a coil of rope, were detached to board some of the barges surrounding the burning boat, and stand by ready to toss the ropes into the river if any of the firemen missed their footing.

Twelve Engine Companies and three Truck Companies, the Chief of Department, one Deputy Chief, and two Battalion Chiefs, with seventeen pieces of motor fire apparatus answered the four alarms; Engine Companies No. 43, 45 and 46 and Truck Company No. 45, Chief Richard L. Smith and Deputy Chief Louis J. Conley, answering the second alarm; Engine Companies No. 52, 42 and 19, in command of Battalion Chief Alexander Reed of the Sixth Battalion, answering the third alarm and Engine Companies No. 50, 48 and 55 and Truck Company No. 46 the fourth alarm.

Eleven pumper streams were used on the fire through 10,450 feet of 2½-inch hose; 550 feet of 1-inch lead line hose for small streams were used in extinguishing the smouldering fire ruins.

The vessel was 235 feet in length over all, and 40 feet in width over all, and had a U. S. Government Marine License to carry 2,500 passengers.

Ten days following the destruction of the large vessel, a negro, residing in Pittsburgh, who gave his age as thirty-six years, walked into the Central Police Station in the downtown business district, and asked to be locked up, stating that he had set fire to the Steamer, "Greater Pittsburgh." He made his admission while police were holding the watchman on the "Greater Pittsburgh" at the time of the fire.

The negro stated that he liked to hear the crack of the flames and built a bonfire on the dance floor of the boat

Ruins of the "Greater Pittsburgh" and One of the Damaged Barges

with paper and wood and that he had watched it burn awhile and then ran ashore. He had spent eighteen years of his life in different penal institutions for various crimes, and had just completed a two-year arson term in the Allegheny County workhouse in February, 1931.

Northern California Firemen—Over three hundred firemen are expected to attend the quarterly meeting of the Northern California Firemen's Association which will be held in Oroville, May 24. There will be a dance and entertainment on the evening preceding the meeting.

TWO-ALARM FIRE DESTROYS SPRINGFIELD, MASS., CHURCH

Considered Largest Church in Western Part of State—Only Absence of Wind and Good Fire Department Work Stops Conflagration

By ROLAND D. ROGERS

FIRE of unknown origin destroyed the Hope Congregational Church in Springfield, Mass., considered the largest church in the western part of the state, recently, and caused a loss estimated at $175,000.

The blaze was discovered by a policeman and an alarm sent in at 4:25 a.m. District Chief Horace C. Feltham ordered a second alarm at 4:55 a.m.

It is generally believed that only good work on the part of the Fire Department, and the absence of any wind, prevented a conflagration, for the fire had had considerable headway.

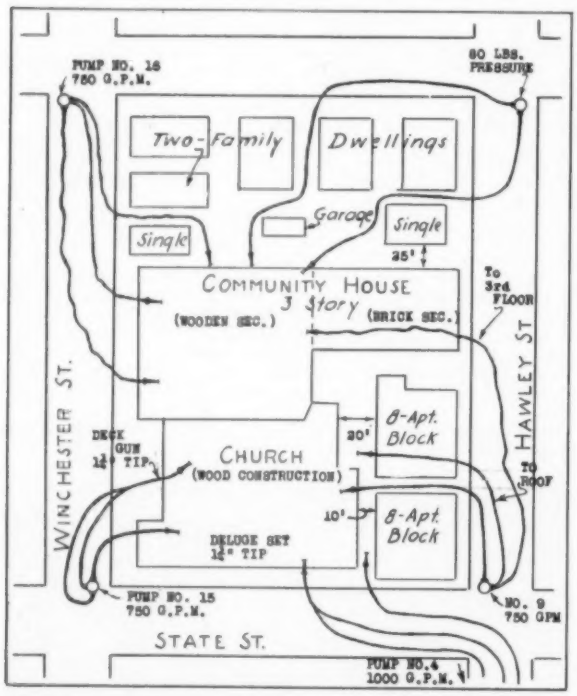


Diagram of Hope Church Fire Zone in Springfield, Mass.

Thirteen lines of hose were laid to keep the fire from spreading to the adjoining community house. Falling slate and ice from the roof were a constant hazard to the firemen. Shortly before 6 a.m., the steeple collapsed into the middle of the church auditorium. As it was impossible to enter the auditorium, firemen and rescue workers attempted to salvage as much as possible from the community house. When the first fire company arrived, flames were breaking from the front dormer window and flames were working up through the partitions. However, it was possible to lay lines to all four side of the structure, and to cool the surrounding buildings.

Only a roofless shell of the church remained. The west side of the community house though not damaged by fire, suffered from the large amounts of water that was poured on it.

Wisconsin Firemen to Meet in Oconto—The annual convention of the Wisconsin Paid Firemen's Association will be held in Oconto, August 4-6. It is expected that thirty-four Fire Departments in the state will be represented.

Athens, Wis., to Keep Apparatus in Village—The Village Board of Athens, Wis., voted to keep the apparatus within the village limits. Most of the runs outside the town have been wasted for no adequate water supply is available in the rural sections.

WHAT'S BURNING

THE following list includes fires of $25,000 loss and over in the United States and Canada, for the periods designated in the headings. These figures, compiled from telegraphic reports, are based on estimates made at the time, and are subject to later investigation and consequent revision. Taken as a whole, however, they give an approximately correct view of the losses incurred. The figures represent loss in thousands of dollars.

Week Ending May 1	Loss in Thousands of Dollars
LENOX, MASS.—Aspinwall Hotel destroyed	800
STIRLING CITY, CALIF.—Business and residential property	80
FARMTOWN, IND.—Main bldg. of Pure Serum Co. destroyed	80
EDGEMOT, S. DAK.—School bldg. destroyed	40
VERONA, N. DAK.—Hotel and adj. business property	25
BERLIN HEIGHTS, OHIO—Three story bldg. destroyed	35
FORT BRAGG, N. CAR.—Two Keystone army planes	150
CASCADE, N. Y.—Fourteen cottages, six garages destroyed	40
N. PORTLAND, ORE.—Mill of Firland Lumber Co.	35
NEW LONDON, CONN.—Bacon Marble block, State St.	30
SASKATOON, SASK.—Elite block damaged	25
N. VANCOUVER, B. C.—Barn of Richards' dairy destroyed	25
FRANKLIN, MASS.—Franklin laundry, adj. property	65
ALBANY, N. Y.—Plant of Eastern Wrecking Co.	40
CLARKSDALE, MISS.—Business property of S. Landry estate	25
POCAHONTAS, MISS.—Sawmill and lumber sheds of H. E. Wilbanks	25
SALUDA, N. C.—Melrose Inn owned by A. M. Salley	65
GILROY, CALIF.—Cannery of Felice & Perelli destroyed	200
MONTEREY, CALIF.—Plant of Calatom Co., 6 mi. out	40
CHICAGO, ILL.—New Era Mission Baptist Church destroyed	25
BEATRICE, NEB.—Main bldg. of First Christian Church	125
IRON CITY, CALIF.—Eight business bldgs. destroyed	25
REVERE, MASS.—Business and apt. block destroyed	45
MARLBORO, MASS.—Shumway Hall, adj. property	30
POMPTON LAKES, N. J.—I. Gelman Dept. store damaged	25
LEMOYNE, PA.—Five houses destroyed, three others damaged	25
RUTLAND, VT.—Bldg. on Rutland Fair Grounds	25
NIAGARA FALLS, N. Y.—Plant of Tedesso Bros., Inc.	25
CHIPPEWA FALLS, WIS.—Barn at State Home for Feeble-Minded	50
HARTWICK, IOWA—Benton Grocery and adj. property	30
LYNCHBURG, VA.—Several business establishments damaged	25
ANDERSON, IND.—Manning block damaged	25

Week Ending May 8	
SEATTLE, WASH.—Plant of Barbee Drydock & Shipbuilding Corp. destroyed	100
WINSTON-SALEM, N. C.—Whse. of Winston-Salem Leaf Tobacco Co.	400
LAS VEGAS, NEV.—Automobile camp destroyed	25
CLEVER, MO.—Schoolhouse destroyed	25
HARRISON, WIS.—Logging camp of Heineman Lumber Co. destroyed	30
CHICAGO, ILL.—Plant of Acme Asbestos Covering & Flooring Co. damaged	25
BAGNELL, MO.—Complete business district destroyed	40
KNOXVILLE, TENN.—Oakwood Mfg. Co. products damaged	25
STAMFORD, CONN.—Cottage of Mrs. M. C. Lockwood destroyed	25
DE WITT, MICH.—Rose & Vail meat packing plant destroyed	50
SAGINAW, MICH.—Carrollton refiner of Peerless Oil Co. damaged	25
BENTON, PA.—McHenry hotel & two stores destroyed	65
OSHKOSH, WIS.—Warehouse of Paine Lumber Co. & adj. property destroyed	80
CHARLOTTE, N. C.—Business buildings on East Trade St. damaged	35
TONAWANDA, N. Y.—Business building damaged	35
SHEPARDSVILLE, IND.—Tipple of mine of Miami Coal Co. destroyed	80
QUEBEC, QUE.—Clement Tannery & adj. property damaged	150
TOLEDO, OHIO—3-story business building on Erie St. damaged	50
TRENTON, N. J.—Capital Theatre damaged	170
TOPEKA, KAN.—Bldg. occupied by American Waste Paper Co.	25
INDIANTOWN, FLA.—Mill and timber of Long-Leaf Lumber Co.	125
NASHVILLE, TENN.—Unit of Ingalls Lumber Co.	40
ST. LOUIS, MO.—Plant of Mound City Roofing Co.	65
SCHUMACHER, ONT., CAN.—Bldg. owned by McIntyre Mines	40
KENEBUNKPORT, ME.—Stonehaven Hotel damaged	30
E. WALPOLE, MASS.—Five stores and post office	45
RUTLAND, VT.—Exposition building, Fair Grounds	80
CASS LAKE, MINN.—Two business establishments	25
PORTSMOUTH, N. H.—McIntosh business and apt. block	80
PORTAGE LAKE, ME.—Property of Portage Lake Lumber Co.	25
EAU CLAIRE, WIS.—Plant of Dunphy Boat Mfg. Co.	65
TROY, MONT.—Mill of Sandpoint Lumber & Pole Co.	50
STAMFORD, CONN.—Sanitarium of Dr. E. C. Gray	35
BAGNELL, MO.—Seven stores destroyed	65
BUFFALO, N. Y.—106th Fd. Artillery, Armory, adj. church	6,000
MORAVIA, N. Y.—Moravia Opera House, adj. property	35
SHEBOYGAN, WIS.—Bldgs. on farm of F. D. Berth, 8 mi. N. W.	25
PAKESLEY, ONT.—Yards of Pakesley Lumber Co. damaged	45
ARKANSAS CITY, KAN.—Ormiston bldg. destroyed	80
LOWELL, MASS.—Lumber yards of Burnham & Davis Co.	45
DOUGLAS, MASS.—Property of Douglas Camp Meeting Assn.	80

Glendale, Ariz., to Buy Apparatus—Glendale, Cal., is considering the purchase of fire apparatus.

C. Smith Re-Elected Chief in Moscow, Ida.—Carl Smith, has been re-elected Chief of Moscow, Ida., for his sixteenth term.

Chief Hafer of Little Rock Re-Appointed—Chief C. S. Hafer of Little Rock, Ark., has been reappointed head of the Fire Department. Chief Hafer has been eligible for retirement several years ago but he has refused to take advantag of his rating.

TRAINING SCHOOL HELD FOR FIRE DEPARTMENT INSTRUCTORS

Quarterly School in Oklahoma City Attended by 33 Cities—First Volume of "The Essentials of Firemanship" Published

By J. E. TAPLIN
Director of the School, Blackwell, Okla.

THE first quarterly school for departmental instructors of the Oklahoma Firemen's Training School was held in Oklahoma City, April 20, 21 and 22. A total of thirty-three cities were represented. While this school was intended for instructors of the individual cities only, other members of the Fire Department were privileged to attend. Besides the regularly appointed instructor or drillmaster, several Chiefs and others attended the meeting, making a total of fifty.

The first volume of "The Essentials of Firemanship," just off the press, was used as a guide for the instruction. A portion of the time was devoted to teacher training under the direction of Prof. Charles W. Briles of A. & M. College.

The general purpose of the quarterly school is to train and instruct the several local drill masters in the work which they are supposed to give to their own department also to determine about how much can be done under practical conditions in each two-hour period to be devoted to instruction and drill.

Immediately following the close of this session, lesson outlines were prepared for the assistance of each instructor in instituting a drill school in his department. These outlines assign a definite number of pages in the text book for study and contain many valuable hints for developing the pertinent points to be brought out from the text book instruction. The results obtained at the school were quite gratifying, as the goal for the first year had been set at thirty cities. This enrollment was exceeded by three.

In these thirty-three cities there are 919 firemen representing a total population of 624,554. This is an average population of 18,925 per city. The smallest city enrolled has a population of 2,100 while the largest city has a population of 182,000. This means that each of the 919 firemen will receive a total of 100 hours instruction annually until the completion of the full course of instruction.

The first volume of "The Essentials of Firemanship" is but one of a series of ten that will be required to cover the course of instruction as outlined. It is hoped that succeeding volumes can be compiled and published about every three months.

While the Oklahoma Firemen's Training School is directly under the supervision of the Oklahoma State Firemen's Association it is sponsored by Oklahoma University, Oklahoma A. & M. College, The Oklahoma Municipal League and The State Board of Education. A budget for the administrative expenses of the school is derived from tuition fees from the individual cities. Oklahoma University, through its extension department, has also made a substantial contribution, and the text books are being printed by The State Board of Education. They have provided only the number of books that would be required in Oklahoma; however, while on the press, arrangements were made for the publication of 500 extra copies which will be available for out of state distribution. A reasonable charge will be made for a copy of this work, if desired by others outside the state. Full particulars can be obtained by writing J. E. Taplin, Director of the School, Blackwell, Oklahoma.

Changes Made in Boston Battery Room

Superintendent George L. Fickett, of the Boston Fire Alarm office, has been supervising changes in the storage battery room whereby a trickle charge system has been installed with individual rectifiers on each circuit. This will reduce by half the number of storage cells which now total 6,800 cells. The total number of alarm boxes on the Boston system is 1,575 not including automatic and A. D. T. Boxes. A new a.c. battery control panel has been mounted. Work is now progressing on the setting up of a master control apparatus for the automatic regulation of the traffic signal lights in the Back Bay district of the city.

Crisco, Ia., to Buy Apparatus—Crisco, Ia., has purchased Pirsch fire apparatus.

Hotel in Lenox, Mass., Destroyed

Outside aid was called to fight a fire that totally destroyed the Aspinwall Hotel at Lenox, Mass., the morning of April 25.

When the Lenox Fire Department arrived in command of Chief Oscar R. Hutchinson, the entire center section of the hotel was completely involved and fire was spreading to the wings. The hotel was five and one-half stories high, 100 feet wide and 425 feet long with a veranda constructed all around. A fire wall separated the center section from the west wing. After the fire it was observed that the fire door on the first floor was part way open. Aid was called from Pittsfield and Lee.

The Lenox pumper was connected to the private water system provided with a 55,000-gallon storage tank. As the tank was only ten feet above the pumper, it was possible to obtain only two lines. These lines were used to prevent the fire from reaching the boiler house. Companies from Pittsfield and Lee formed a relay when they arrived. The Pittsfield pumper was placed at the hydrant and the Lee pumper 1,650 feet away. In all 4,050 feet of hose were used in this relay. This line was taken to the roof of the boiler house and prevented fire from the hotel spreading over a passageway to the boiler house.

It was necessary to station men in the woods to prevent fires caused by the flying embers. Burning brands were carried to buildings in the village, one quarter mile away.

ROLAND D. ROGERS.

Melendy Chief of Nashua

Albert C. Melendy has been appointed Chief of the Fire Department, Nashua, N. H., to fill the vacancy caused by the death of James E. Smith.

Chief Melendy started his fire Department activities as a torch boy, June 1, 1885. On October 1, 1889 the department elected him a call man. Three years later he was elected a permanent fireman and chosen driver of Hose No. 1; two months later he was transferred as driver of Engine No. 1. On July 1, 1894 he was shifted to Ladder No. 2. Mr. Melendy was promoted to Engineer of Chemical No. 1 on June 1, 1896 and Captain on February 1, 1908. He was elected Deputy Chief on May 1, 1918. On April 28, 1931, he was chosen Chief of the department.

Chief Albert C. Melendy

Oshkosh Chief Resigns

Fred W. Lambert, Chief of Fire Department, Oshkosh, Wis., a member of the department for thirty-six years and Chief since 1924, has presented his resignation to take effect May 31.

He joined the department June 10, 1889 and left the service April, 1894. On May 23, 1895 he again entered the department and served for thirty-six continuous years.

Mr. Lambert was appointed lieutenant in 1903, captain in 1911 and Assistant Chief in 1920. Chief Lambert was promoted to head of the department, November 3, 1924. He is sixty-nine years old.

It Was Only a Two-Cent Fire!

Two copper pennies tucked away where only a fire official could possibly find them, told an undisputed story of what caused the destruction of the Providence Street Junior High School in Worcester, R. I., with a loss of $400,000. The pennies were found by Chief McCarthy in a temporary fuse box connecting the wires running into the auditorium and a wire running outside the main entrance and hung on scaffolding in front of the building. Fire started in the outside scaffolding.

New Fireboat For Portland, Me.

A new steel Diesel fireboat for Portland, Me., is nearing completion at the yard of Rice Brothers, East Boothbay, from plans by John G. Alden, Boston naval architect.

This boat will have a greater capacity than any fireboat of her size previously built, being able to pump 8,000 gallons of water per minute at 125 pounds pressure, 6,800 gallons per minute at 150 pounds pressure, and so arranged that the pumps may be used in series, delivering over 3,000 gallons per minute at 300 pounds pressure. This is believed to be the first boat designed for 300 pounds pressure although the latest New York fireboat now under construction has the same provision.

As the result of a year of careful investigation it was decided to use modern high speed Diesel engines in preference to gasoline engines because of the greater fuel safety and the elimination of constant attention as would be required in the case of steam.

Altogether there are six engines totalling 1,100 horsepower. Four 200 horsepower engines drive the Dean Hill centrifugal pumps, one 200 horsepower engine operates the central propeller, and there is a generating set of 100 horsepower. Two of the pump engines may also be used for propulsion, giving a total of 600 horsepower and an approximate speed of 15 miles per hour when the boat is on its way to a fire. The center engine is used wholly for propulsion and to hold the boat against the water stream when the pumps are in action. All engines are Cummins Diesels operating at normal speed of 900 revolutions per minute. Fuel is carried sufficient for full fire fighting capacity of 24 hours and an emergency tank is provided to run all equipment for an additional two hours in case of damage to the main fuel tank.

Water may be delivered through any of the four Morse nozzles and 18 hose connections, the tower nozzle being of 3,000 gallons capacity and the other three of 2,000 gallons capacity. A feature of interest is that reels have been discarded and the hose is flaked down in deck boxes in the same manner as in hose wagons on shore. The two boxes have a capacity of over 8,000 feet of hose. When kept in this way the hose will last longer and is much better protected from the weather.

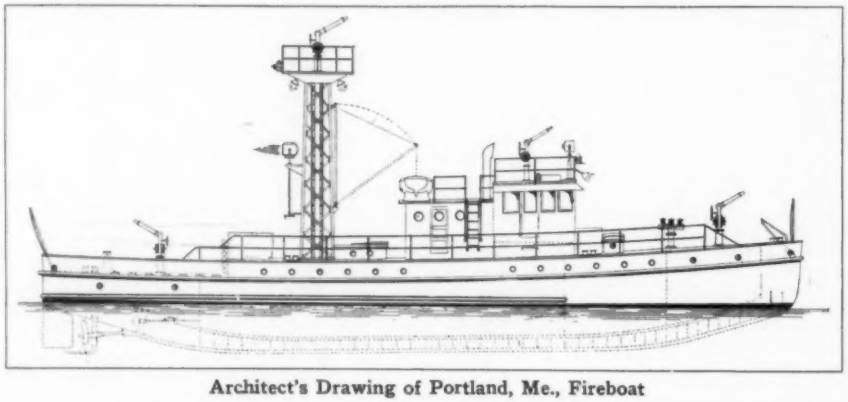
For use at oil fires and ship fires, a foam outfit will be carried and a small workboat will be fitted with an outboard motor and centrifugal pump to get under docks.

The crew's quarters and engine room are heated by hot water and the vessel will be equipped with radio sending and receiving apparatus in order to keep in communication with fire headquarters in the city.

The boat is built to American Bureau of Shipping classification. It is 90 feet in length overall with 22 feet beam and draft of 5½ feet. The hull is reinforced forward for breaking ice and the design is such that the craft can get close to the beaches on the various islands of Casco Bay which are considered within Portland's fire fighting province.

Chief Oliver T. Sanborn, of the Portland Fire Department, believes that this modern floating fire fighting unit will prove invaluable as an adjunct to the land forces. The new vessel replaces an old steam fireboat which has been in service for many years.

HARRY BELKNAP.



Architect's Drawing of Portland, Me., Fireboat

Business Area of Sound View Damaged

Shore front property in Eastern Connecticut suffered its second serious loss of the present year when fire broke out in a new moving picture theatre at Sound View, near Niantic, Conn., and before it was extinguished by firemen of the Old Lyme and Niantic Departments, had consumed a large portion of the thickly settled part of that community. Sound View is a community of summer homes located in one of the most beautiful sections of waterfront along the Eastern shore of Long Island Sound.

Included in the structures destroyed were the movie house and dance hall adjoining three stores and four cottages. In most of the buildings the entire contents were destroyed and the flames spread so rapidly there was no time to remove furnishings or stock. Three members of the Niantic Volunteer Fire Department were injured during the fire. The cause of the fire is unknown. Damage was estimated at $50,000.

THOMAS F. MAGNER.

Handbook of Oil Burning

The American Oil Burner Association has just published a new "Handbook of Oil Burning," containing information of value to the engineer or contractor in the field of oil burning heating or power equipment. It discusses in detail the different oil burner types and principles of construction, oil burner types and principles of construction, oil burner controls and motors and fuel oil tanks and storage. The volume is printed in pocket size and contains 629 pages including 358 illustrations and a large number of tables. The book was compiled by Harry F. Tapp, Executive Secretary of the Association.

Firemen Must Flag Cross Traffic

Edwin D. Barry, Safety Director, Cleveland, Ohio, has issued an order that whenever fire apparatus is speeding to or from a fire, and the company is approaching a red traffic light, a member must jump off the apparatus, rush on ahead to flag crossbound traffic, and then board the apparatus as it rolls by.

The twenty-five Battalion Chiefs are also affected by this order. They are directed to slow down when they approach red lights and then carefully watch to see if pedestrians or vehicles are about to cross. The Chiefs' drivers have been ordered returned to regular duty.

The new "red light order" was issued after fire apparatus returning from a fire ran through a red light and damaged an automobile.

Connecticut Firemen Meet in August

One firemen's convention is to face present conditions. At a meeting of the Executive Committee of the Connecticut State Firemen's Association held recently, the committee voted to hold the 1931 convention at West Haven, Conn., but it was unanimously decided that "the West Haven Fire Department, as host, or the civic authorities, assume no expense or go to any trouble concerning entertainment of the visitors, on account of the general economic depression" to quote David W. Harford, Secretary of the Connecticut State Firemen's Association.

Heretofore Connecticut firemen looked forward each year to a two-day period of real entertainment and every city or town where the conventions have been held during the 47 years of the association's existence, tried to outdo the other in various forms of entertainment. This year there will be the regular business meeting minus the side issues.

Several important propositions of much interest to the firemen of Connecticut will be presented at the August convention and it is expected, according to Secretary Harford, that there will be some changes made in the present constitution and by-laws. The matter of establishing college

courses in training of firemen in Connecticut will be introduced and urged for action. According to Secretary Harford, the largest number of claims and the greatest amount of benefits involved in the history of the organization, are recorded for the fiscal year of the association which terminated on April 30.

THOMAS F. MAGNER.

Arguments for the 3-Platoon System

A circular is being distributed by the Uniformed Firemen's Association of Greater New York as one of the steps to win public opinion towards the adoption of the 3-platoon system for firemen in the New York Fire Department. The following arguments for the eight-hour day are set forth in the bulletin:

Under the present antiquated two-platoon system every fireman works eighty-four hours per week, or an average of twelve hours per day. Members of the fire force are divided into two platoons. One platoon works from 9 a.m. until 6 p.m.; the other platoon from 6 p. m. until 9 a.m. In other words this is a compensating system. One man works when the other is off, and in inverse order. Every sixth day the men work a full twenty-four hours, from 9 a. m. until 9 a. m. the following morning.

The firemen are the only Federal, State and Municipal employes who work more than eight hours per day, and who receive no day off from the City of New York.

If, in the opinion of the Chief of Department, an emergency should exist at any time, the men can always be held for continuous duty. The firemen do not object to this stipulation. They accept it as part of their calling. If an eight-hour working day is granted to the firemen it will in no way affect this wise provision.

Uniforms are paid for by the men, and are subject to a rigid daily inspection by the commanding officers.

All rubber goods, boots, coats, helmets and other personal equipment are paid for by the firemen themselves.

The salaries of the matrons in the fire-houses are paid by the firemen. These matrons are appointed by the Fire Commissioner.

Every man in the fire department must be an American citizen. He must pass a strict physical and mental examination under the rules and regulations of the Civil Service Commission.

The slogan of American labor today is reduction of working hours. It has been the experience of labor and industry in this country that a reduction in working hours has brought about more normal living conditions, and invariably resulted in a consequent increase in the efficiency of the workers.

The American Federation of Labor, and the New York State Federation of Labor, as well as the Central Trades and Labor Council, have endorsed the eight-hour day for firemen in the City of New York, and the executive boards of these bodies were instructed to work in conjunction with the Trades and Labor Assembly, and all trades unionists, to have this proposition put into effect.

The hardships and perils, risks and hazards of the profession of fire fighting are accepted traditionally as part of the job by all the firemen.

We know that the firemen have the full confidence and respect of the people of this great city, who are anxious at all times to show their admiration and gratitude toward the men whose cardinal duty it is to protect their lives and property at all hours of the day and night.

On the basis of a five to ten thousand dollar assessed valuation which is a reasonable estimate for the average small home owner, the cost will be from $1.50 to $3.00 per year. This amounts to an increase of only three-tenths (3/10) of a mill per annum. These figures are arrived at under the existing budget and the assessed valuation for the year 1930, and can be verified upon investigation.

W. P. Battle, of Augusta, Dead

William Patrick Battle, sixty-seven years old, First Assistant Chief of the Augusta, Ga., Department since 1913, died at his home following a four days' illness.

He was born in Richmond County, Ga., December 13, 1863. He joined the Fire Department, January 28, 1888 and has been in the department forty-three years—eighteen years after he was eligible to retire with a pension. On January 10, 1901, he was promoted to lieutenant of a ladder company and three years later was made a captain in charge of a chemical engine company. Mr. Battle was advanced to second assistant chief, January 7, 1911 and two years later was made first assistant chief.

He is survived by a brother, sister, grandson, and a number of nephews and neices.

JOHN A. STULB.

Berkeley Lowers Fire Losses

Fire prevention campaigns that have been conducted by the Fire Department of Berkeley, Cal., are beginning to show concrete results. In 1929 the fire loss was $78,595 while in 1930 the loss was but $38,660. Property involved during 1929 was valued at $8,459,845 while in 1930 the figure amounted to $5,675,765.

The value of proper roofing material is appreciated. In 1929 and 1930, eighty-five per cent of the roof replacements were of fire retarding material as against fourteen per cent renewed by wooden shingle roofs. According to Fire Department records, the greatest number of calls were for roof fires.

Start Fires to Draw Pay

Forestry officials in the province of Manitoba, Canada, have charged that residents of isolated north county areas have been making jobs for themselves by setting forest fires and then hiring themselves out to fight them. Both Provincial and Royal Canadian mounted police have been sent to the fire areas to stop this practice.

Boston Department Has Busy Morning

The Boston Fire Department made a quick stop of a very threatening blaze in an old piano factory on March 23 and while a four-alarm response of apparatus was at this fire, a second alarm fire took place in the Roxbury district as well as two single alarm fires in other sections of the city. It was a busy morning for the fire fighters with several other fires occurring later in the day, but mostly of a trivial nature.

While Engine Company No. 3 and Ladder Company No. 3, from Harrison Avenue and Bristol Street, were responding to a still alarm from the Old Colony Furniture Company, a box alarm was sounded at 9:09 a.m., for the same fire. A second alarm was ordered at 9:16, third at 9:22, and fourth at 9:31.

The blaze was caused by a flareback in the boiler room where rubbish and celluloid scraps were being burned. A number of automatic sprinkler heads opened and the engineer of the building, believing that the fire had been extinguished, shut off the sprinkler valve to prevent flooding the engine room. Meanwhile the fire had traveled through conveyors and belt holes to other floors of the building and was raging fiercely when the first apparatus reached the scene.

The structure involved was of brick, second class construction, 4 stories in the front and 6 stories in the rear, 120 by 180 feet, and 70 feet high. It connected with other units of the plant which used to be the Grover and Baker Sewing Machine Company and was later occupied by the McPhail Piano Company.

Occupants are the Old Colony Furniture Company, Pendleton Wood Heel Company and several shoe concerns.

Hose lines, fed by motor pumping engines working from post and Lowry hydrants with hydrant pressures ranging from 45 to 60 pounds, were taken over stairways and ladders, to a rear court, and to adjoining roofs. Lines were also used to sprinkler connections on the outside of the buildings, the engine pressures being from 125 to 140 pounds.

Chief Henry A. Fox directed the department operations and was aided by Assistant Chief Henry J. Power, Deputy Chief Thomas H. Downey, District Chief William Coughlin, District Chief Edward J. Locke, and Acting District Chief Shepard. Other officials at the scene were Fire Commissioner Edward F. McLoughlin, Police Commissioner Eugene C. Hultman, Chief Clarence R. Randlett, of Newton, and Chief Selden R. Allen, of Brookline. Officers of the Boston Board of Fire Underwriters and the New England Insurance Exchange also visited the scene and discussed the circumstances of the fire with Supt. Peter E. Walsh, of the Boston Protective Department.

The damage to the building was $25,000, to the furniture company $35,000, and to the heel firm $10,000, making a total of $75,000. The fire was checked just as it was entering the second floor of the front wing through a partly opened fire-door.

There were eighteen engine companies and six ladder companies at the four-alarm fire, and there were six engine companies and four ladder companies at the second alarm blaze in an apartment house.

The response of apparatus was as follows: First alarm, Engines 3, 22, 26, and 23; ladders 13 and 3; Rescue Co. 1, chief of District 7, and chief of Division 2; second alarm, Engines 35, 15, 10, 43, and 39; Ladders 17 and 5, Water Tower 2, and chiefs of Districts 5 and 9; third alarm, Engines 6, 24, 21, and 32; ladder 18, Water Tower 3, Chief of Department and Assistant Chief; fourth alarm, Engines 50, 16, 7, 34, and 2, and Ladder 20.

Owing to the second alarm in Roxbury, Engine 39 was sent in place of Engine 13 by direction of the fire alarm

office; Engine 37 was ordered to the apartment house instead of to the factory on the third alarm; and Engine 2 responded in place of Engine 42 on the fourth alarm. The alarms for the two-alarm fire were received at 9:15 and 9:20 a.m., the fire being at 14 Watson Street.

In spite of these two multiple alarm fires the city was adequately protected due to the efficiency of the "covering-in" system in effect in the Boston department which functioned well although the long jumps made by the companies changing locations have been criticized in some quarters.

HARRY BELKNAP.

CORRESPONDENCE

Legislation Looking to the Training of Volunteers

To the Editor:

I write to congratulate you upon your strong criticism of our Governor's veto of the bill which would have encouraged volunteer firemen to receive the education they so largely need and which the zone training schools now afford.

There is one point which I feel you overlooked in your comment, and I hope you will make use of it so that the people generally may be spurred to some action to bring about enactment of such a law at the next session.

The point I would make is that, regardless of the mere wishes of the volunteer firemen themselves, the proposed law would have operated to the distinct and direct benefit of the whole populace of the State, in that (a) volunteer firemen would be generally more efficient in their operations and less loss of time from industry and (b) because of this improvement and consequent reduction in losses, insurance rates would be proportionately lowered.

As a volunteer fireman of some years standing, I feel that even if such an impossible situation existed—as the Governor imagined—that volunteers were opposed to such a measure, the public needs should have prompted his approval.

Very truly yours,

WM. PAUL BABCOCK,
Nyack, N. Y.

Jackson, Miss., Holds Drill Contest

Each year a cup and other prizes are awarded to the winning fire companies of Jackson, Miss., who make the best time in a series of evolutions. L. F. McDonald is Chief of the Fire Department. The cup this year was won by Engine Company No. 2, second prize by Engine Company No. 1 and third prize by Engine Company No. 6. Seven companies competed. The list of evolutions and the best time made follows:

Laying out one line of hose from fire plug located 100 feet from building to top of 50 foot ladder placed on three story building showing water out of nozzle at top of ladder shutting down hose line with proper tools and replacing burst section on ground and showing water again; Time—1 minute and 56 seconds.

Layout from plug 250 feet of hose to front of building, men to carry one axe, hose roller and rope up stairway to top of three story building, station hose roller with chimney hitch drop rope make clove hitch on hose and half hitch on nozzle, pull two lengths of hose on top of buiding, station hose on top of building with proper hitches and show water. The fifth section is burst, use hose clamp and replace section on ground, pull hose up and get in position as at first and show water. The third link is burst; shut down and lower hose with rope to ground and replace link, man on ground to retie rolling hitch, hose is then pulled up and get in position as before (2 links on top) and show water. Time—6 min. 44 sec.

Starting in front of building with men on pumper make pumper connection to fire plug 250 feet down street, lay two 100 foot lines and show 75 pound pressure on pump gauge. Time—1 min. 15 sec.

Starting at a distance 400 feet from fire plug and make backward layout a distance of 250 feet from fire plug using one line of hose. Time—52 seconds.

Chauffeur on ground start motor and show 80 pound pressure on booster pump. Time—12 seconds.

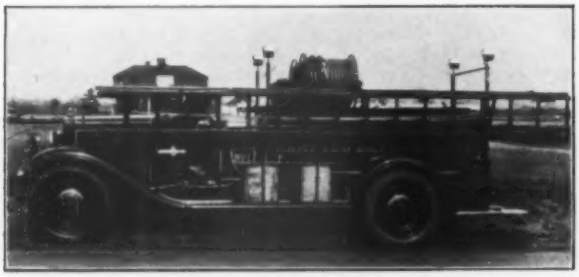
Portable turret nozzle is on apparatus using four 50-foot lengths of hose lying on ground; move portable turret from apparatus, set up, connect hose and show water. Time—51 seconds.

Hook up Deluge set in front of building using three 50-foot lengths of hose to fire plug 100 feet from starting point and hook up same. Time—54 seconds.

Lay two 100-foot lines into turret pipe on apparatus from fire plug 100 feet from starting point and show water. Time—30 seconds.

Lay one 100-foot of hose into cellar hole using revolving nozzle, show water. Shut down, replace with Baker cellar nozzle and show water. Time—44 seconds.

All evolutions were performed with six men except single man evolutions.



Apparatus Delivered to Hampton Bays, L. I., N. Y.

Fire apparatus designed for fighting brush fires has been placed in service at Hampton Bays, L. I., N. Y. A Barton 300 g.p.m. pump is mounted in front of the engine. Much of the space that would normally be occupied by hose is taken by a large water tank of 325 gallons capacity. It was assembled by the Amagansett Garage of that village.

Newly Elected Chiefs

The following have been elected to head the Fire Departments in their respective municipalities:

Geneseo, Ill.—Theodore Giebel
Cresco, Ia.—Fred Burr
Fairbury, Neb.—Richard Evans
Chillicothe, Tex.—W. L. Ledbetter
Hutchinson, Kan.—Joseph Bennett
Auburn, Neb.—Ernest Galloway
Franklin, N. Y.—W. F. Phelps
Keyport, N. J.—Ernest G. Bailey
Amityville, N. Y.—William Torns
Hagerman, N. Y.—Ralph Perry
Hope, Ark.—O. L. Wyatt
Coffeyville, Kan.—Sol. E. Hanna
Southold, N. Y.—Nat E. Booth
Pleasantville, N. Y.—Clarence Yorks
Palm Springs, Cal.—Joseph Omlin
Onawa, Ia.—William Hale
Madison, Neb.—Dave Neely
Langley, Wash.—Albert Melson
Elkhorn, Wis.—R. B. Harris
Klemme, Ia.—Martin Brinkman
Marion, Wis.—Albert Seidenkranz
Spring Valley, N. Y.—Harry M. Frederick

Massachusetts Chiefs' Club Meets

Mayor James M. Curley, of Boston, was a guest and speaker at the meeting of the Fire Chiefs' Club of Massachusetts held at the Parker House in Boston on April 15.

President Selden R. Allen, Chief of the Brookline Fire Department, directed the meeting and introduced the speakers. The guests included Senator Donald R. Nicholson, of Wareham, Mass.; Senator James J. Twohig, of South Boston; State Fire Marshal John W. Reth; Edward L. Dolan, Boston City Treasurer; Samuel Silverman, Corporation Counsel; Stanley White, Director of Municipal Celebrations; Joseph Saxe, of the Boston *Herald-Traveler*; and Mayor Stephen H. Foley, of Attleboro, Mass.

Chief Edward E. Spooner, of Fairhaven, Mass., was elected an active member of the club.

A report was received from the committee on standardization of small hose threads. This committee was composed of Chief John W. O'Hearn, Watertown; Assistant Fire Warden John P. Crowe, Westboro; Chief Edward F. Dahill, New Bedford; and John Barker, Boston Coupling Company.

Senator Twohig presented the club with a copy of the automatic gas shut-off bill which has recently become a state law and with the pen used by Governor Ely in signing this bill which has long been advocated by the fire chiefs.

Besides Mayor Curley the speakers were Fire Marshal Reth, P. C. Charnock, of the New England Insurance Exchange; Superintendent Peter E. Walsh, of the Boston Protective Department; Mr. Walker, of the National Fire Protection Association; Fire Commissioner Austin, of Nashua, N. H.; Chief William H. Daggett, of Springfield; Chief John W. O'Hearn, of Watertown; Chief Daniel L. Johnson, of Waltham; Chief Ray D. Wells, of Falmouth; Senator Twohig, Senator Nicholson, Chief James M. Casey, of Cambridge; Ex-Chief A. Howard Fiske, of Framingham; Ex-Chief John P. Doyle, of Wellesley; A. H. Blanchard, of A. H. Blanchard Inc., Cambridge; Justin McCarthy, of the Henry K. Barnes Company, Boston; and John Campbell, of the Edison Electric Illuminating Company.

Mayor Curley urged the enactment of legislation requiring the installation of automatic sprinklers in all business structures and in all dwellings containing four families or more. Marshal Reth spoke on Fourth of July regulation of fireworks and on civil service protection for fire chiefs.

A silent tribute was paid to the memory of the late Chief James E. Smith, of Nashua, N. H. Commissioner Austin, of Nashua, thanked the club for the large attendance at the funeral.

HARRY BELKNAP.

Firemen's Compensation for Injuries

(*Continued from page 346*)

determination to a mathematical certainty as to exactly when, during the performance of his duties as a fireman, the hemorrhage took place was not necesary."

City Pension Law Bars Payment from State Funds

Obviously, a pension cannot legally be paid to a disabled fireman, unless some valid law authorizes such payment.

For instance, in Ogilvie vs. City of Des Moines, 233 N. W. 526, a state law provides for paying from the general funds of the state compensation for all injuries or death of any law enforcing officer injured or killed while in line of duty or from causes arising out of or sustained from their official employment, except policemen pensioned under the policemen's pension fund. Another law provides for city pension funds for payment to police officers by municipalities having a specified population.

A policeman who was killed was eligible to the city pension. His dependents contended that they were entitled to compensation payable from the state funds. However, the Court held that they were not entitled to this state compensation, saying:

"It is thus apparent that, since the deceased policeman came within the provisions of the statutes creating the policemen's pension fund, and since the appellants are entitled to relief from said fund, they are not entitled to any relief under the Workmen's Compensation Act. . . . We conclude that the deceased policeman during his lifetime was not entitled to compensation under the Workmen's Compensation Act, and that his dependent children are not now entitled to an award under said act."

Another important point of the law is that, as a general rule, trustees of a pension fund are not vested with discretionary power to grant or refuse pensions, but are required to exercise their discretion in specifying, by rules and regulations duly approved, the qualifications of those entitled to pensions and the amount.

For instance, in the late case of State vs. Jones, 174 N. E. 780, it was disclosed that a state statute provides for the creation, management, and distribution of pension funds. Also, a board of trustees came into existence under the law which provides that "such trustees shall make all rules and regulations for distribution of" said funds, and that "no rules or regulations shall be in force until approved by a majority of the board of trustees."

The evidence disclosed that the trustees met and elected a president and secretary and the latter was ordered to write to several cities for a copy of their rules and regulations, to be used as reference by the board in adopting their rules.

The evidence further showed that later such copies from other cities were obtained and that a member of the board prepared a proposed set of rules and regulations, which was the subject of discussion at subsequent meetings of the board. Motion was made and seconded by which the proposed rules were adopted.

Soon afterwards a captain communicated with the trustees stating that he had resigned as captain and made application for a pension. The trustees voted on the application and a vote of the trustees was evenly divided against and for granting the pension. The captain then filed suit to compel the board of trustees to declare him a beneficiary of the pension fund.

In holding the captain not entitled to a pension under the circumstances, the Court said:

"The trustees are not vested with discretion to grant or withhold pensions, but they do have power to exercise a discretion in specifying, by rules and regulations duly adopted, the qualifications of those to whom a pension shall be granted and the amount thereof, and the object in requiring the adoption of rules and regulations is to conserve the fund and secure distribution according to fixed standards applicable to each class of beneficiaries. . . . Our conclusion is that the trustees did not intend to adopt, and the language used does not warrant a finding that they did adopt, rules and regulations for the distribution of said fund, and therefore the relator is not entitled to the relief sought."

Westmoreland, Cal., to Form Departments—Steps have been taken in Westmoreland, Cal., towards the organization of a Fire Department.

Seattle to Have New Assistant Chiefs—In accordance with a plan of Chief Robert L. Laing, Seattle, Wash., thirteen battalion chiefs were made assistant fire chiefs and the office of batallion chief will be abolished. The men will receive an increase of fifteen dollars a month. Chief Laing also plans to have a fire college, the improvement of the department drill school, and the organization of a battalion of fire-fighters under an assistant chief for West Seattle.

The Round Table

(*Continued from page 348*)

all the light one can get at a night fire is a great help to the men in discharging their duties whatever they may be, either ladder work, hose company tasks or pumping jobs.

The only lighting equipment we have at present is three searchlights on our ladder trucks, two on a hose truck and two on each pumping engine, all of which work very satisfactorily.

I think lighting the front of the building on fire does help in getting action at night fires.

Charlotte Opens City Radio Station

First official broadcast over the Charlotte, N. C., Fire and Police Department Radio Station, WPDV were successfully made recently, it was announced by T. C. Wood, Jr., who built the broadcasting station.

Installation of a broadcasting station to serve both Fire and Police Departments and aid them in their work is considered by city officials as a distinct step in increasing the efficiency of these departments. All city cars will be equipped with receiving sets so that broadcast information can be received by the officers while they are touring the city.

One of the novel arrangements of the broadcasting equipment is that the station will not be in operation except

Broadcasting Equipment of Charlotte Radio Station

Seated is T. C. Wood, operator and builder of the set and standing is his assistant, Dick Basinger.

when information is being broadcast. Controls will be placed at microphones in the Fire Department and Police Department headquarters.

Receiving sets will be equipped with a device which will start a buzz when the power is turned on in the transmitting station. Officers will then know when information is being broadcast, and can turn on their receivers.

Charlotte will be the only city in the South between Washington and Miami to have a radio used in conjunction with Fire Department work, according to the builder of the station.

D. G. SPENCER, JR.

Apparatus Delivered to St. Charles, Mo.—A 750-gallon General pumper has been delivered to St. Charles, Mo.

W. Springfield to Use New System Soon—It is expected that the new fire alarm system of West Springfield, Mass., will be placed in service some time in July.

Stanwood, Ia., to Have Rural Apparatus—Special fire apparatus provided with a Barton pump has been delivered to Stanwood, Ia., for fighting rural fires.

Texas Firemen to Meet in June—The Texas State Firemen's Association will hold its annual convention in Bryan, June 9-11. Notices have been sent to all the members urging them to attend.

FIRE PREVENTION ORDINANCE FOR CITIES AND TOWNS

Ie Establishes Bureau of Fire Prevention—Prescribes Regulations for Hazardous Materials and Processes

(*Continued from last issue*)

THE following Fire Prevention Ordinance has been prepared by Engineers of the National Board of Fire Underwriters and is recommended by that organization for adoption by cities and towns. While it is not expected that in all cases smaller cities will find need for an ordinance of such length, it is recommended by the Board that a complete set of regulations be adopted in all cases, for even though there may be no immediate need of regulation of a particular hazard, every growing community is sure to have these hazards introduced sooner or later, and it is better to be prepared for them than to develop unrestricted and then try to regulate them. The ordinance is being published in its entirety serially in FIRE ENGINEERING. *Continuation of Part* 18, *Fire Exits*:

1803. No obstruction shall be permitted in hallways of tenement houses or apartment houses.

1804. All doors, aisles and passageways within and leading into or out of theatres, churches, and all other places of public assemblage shall be kept free from easels, signs, standards, campstools, chairs, sofas, benches and any other article that might obstruct or delay the exit of the audience, congregation or assemblage during the entire time during which any show, performance, service, exhibition, lecture, concert, ball or other assemblage may be held, and it shall be unlawful for any person to sit or stand or remain seated or standing, or to allow any other person to so remain in any such place of public assemblage in any aisle under any circumstances, or in any exit or passage required for the safe exit of the assemblage. Clear passage from all exits and on sidewalks must at all times be maintained outside of all theatres and other places of public assemblage. No aisle, passageway or stairway in any store shall be obstructed with tables, show cases, or other obstruction during hours said store is open to the public. It shall be the duty of the Chief of the Police Department to render assistance in the enforcement of the provisions of this part and to direct and require police officers to enter all places of public assemblage for such purposes.

Part 19.—Fire Extinguishing Equipment

1901. All basements, cellars and sub-cellars exceeding 2,000 square feet in area within enclosing masonry walls, and used for the storage, sale, manufacture or handling of materials indicated in Section 1902, shall be equipped with a standard wet pipe system of automatic sprinklers and with supply from city water mains or other suitable source of supply. Where adequate heat is not provided, such systems may be omitted if in the opinion of the Chief of the Bureau of Fire Prevention, concurred in by the Chief of the Fire Department, the hazard is not severe, provided that such places shall be equipped with a suitable dry sprinkler system with a fire department connection on the building front, or with suitable cellar flooding holes properly distributed in the first floor of the building, or with an approved standpipe system, with fire department connection on the street and control devices so located and arranged that streams from nozzles on the standpipe can be controlled from the outside of the building, and also that all such places shall be provided with an approved automatic heat-actuated alarm system connected to an outside gong or to the central station of a supervising company.

1902. Basements, cellars and sub-cellars requiring the above protection are those in connection with: Rag, paper or junk storage; shipping, receiving or storage of furniture, dry goods, toys and other articles involving quantities of excelsior, moss, paper and like materials; manufacture of articles containing or involving highly combustible materials; storage of dangerous chemicals, acids or flammable liquids.

1903. The Chief of the Bureau of Fire Prevention shall survey each mercantile and manufacturing establishment, each school, church, theatre, or other place of a semi-public character, each hospital or place of detention and each apartment house or tenement building and shall designate first aid fire appliances in or near boiler rooms, kitchens of restaurants, clubs and like establishments, storage rooms involving considerable combustible material, rooms in which hazardous manufacturing processes are involved, garage sections, and other places of a generally hazardous nature. Such appliances shall consist of automatic alarm systems, automatic sprinklers, standpipe and hose, fixed, wheeled or portable chemical extinguishers of a type suitable for the probable class of fire, or suitable asbestos blankets, manual or automatic covers or the introduction of an inert gas. In specially hazardous processes or excessive storages appliances of more than one type may be required or special systems installed.

1904. Failure to install or provide the equipment ordered by the Chief of the Bureau of Fire Prevention, and to maintain it in operative condition at all times, shall be considered a violation punishable as indicated hereinafter in this ordinance. Repeated disregard of such orders shall constitute sufficient basis for the revoking of any permit held.

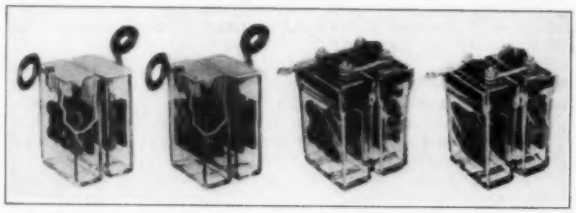
Part 20.—Gas Appliances and Connections

2001. All gas service pipes 2 inches in diameter and over shall be equipped with a gate valve for shutting off the gas, located outside the building. All new service pipes under 2 inches, except those for residence buildings intended for not more than two families and having not over 15 sleeping rooms, shall have an outside cock or valve shut-off.

(*To be continued*)

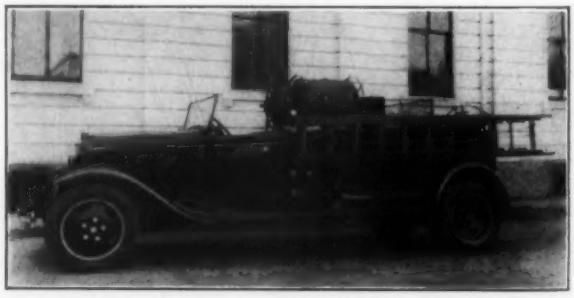
Gamewell Announces New Batteries

Three new and one improved cells of battery, designed specially for fire alarm signal systems, have just been announced by The Gamewell Company. They are known as the FIP, ICO, BTIS, and ICS types. The first two are open type cells, and the two latter are of the sealed-in style. The former are recommended for use on large systems where there is a competent man available at all times to care for the battery; the latter, for the smaller systems where the care of the entire system falls upon the shoulders of one man.



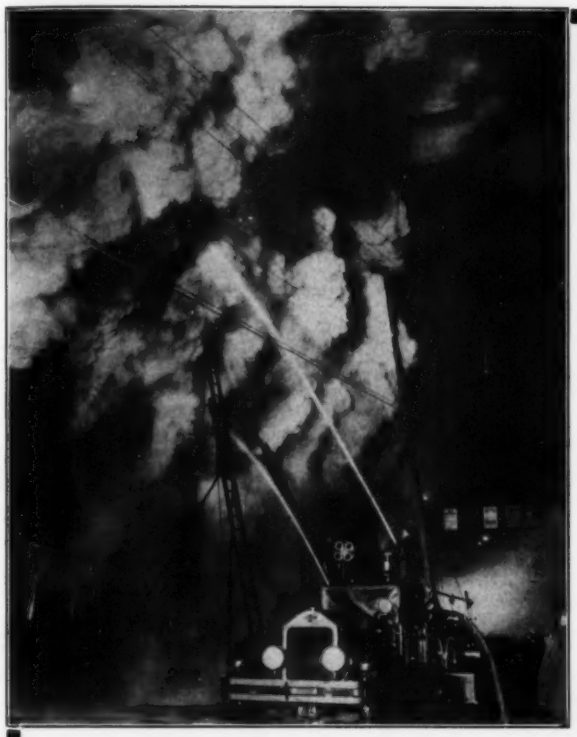
The New Line of Gamewell Fire Alarm Batteries

Changing conditions in the fire alarm field have been met by The Gamewell Company, with the development of this new battery. The FIP and BTIS types are recommended for the present type of system found in use everywhere—duplicate sets of battery, cycle charged. On the other hand, the ICO and ICS have been designed particularly for the floating battery system which is now being offered by The Gamewell Company where a battery of slightly larger capacity is desirable.



Maxim Fire Apparatus on a Ford Chassis

A special unit designed for fighting forest fires is being built by the Maxim Motor Company on a Ford chassis. The apparatus has a 360-gallon capacity water tank, a 100-gallon booster pump, one hose reel with 1,000 feet of 1½-inch cotton rubber lined hose and two hose reels with 300 feet of ¾ inch hose coupled on each reel. In addition, the apparatus carries ladders, extinguishers and hand tools.



Late discovery of fire and tardy transmission of the first alarm were responsible for this being a three-alarm fire . . . and a $30,000 loss.

$30,000 Late!

Translating time into *MONEY* . . . the fire department received summons to this blaze about $30,000 late!

The bulk of this loss could probably have been prevented—with prompt discovery and instant notification of the fire.

A. D. T. Aero Automatic Fire Alarm "feels" fire at the start and electrically sends in the alarm. Quickly, fire fighting apparatus is upon the scene; always, fire losses are minimized.

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ESTABLISHED 1907

FIRE DEPARTMENT ACTIVITIES

Belle Vernon to Have Fire Station—Belle Vernon, Pa., is planning the erection of a fire station.

Worcester, Mass., Buys Apparatus—Worcester, Mass., has placed an order for an Ahrens-Fox city service truck.

Burley, Ida., Expects Pumper—A 600-gallon pumper is to be delivered to Burley, Ida., this month.

Cornerstone Laid in Sayville, N. Y.—The cornerstone of a new fire station has been laid in West Sayville, N. Y.

Minerva, O., Votes for Fire Apparatus—Minerva, Ohio, has voted to purchase a 300-gallon pumper.

Corning, Ia., Has New Apparatus—A W. S. Nott 500-gallon pumper has been delivered to Corning, Ia.

New Car for Chief James Granger—A red painted sedan has been delivered for the use of Chief James Granger of Cleveland, Ohio.

Apparatus Recommended for Albany, Ga.—Chief D. W. Brosnan of Albany, Ga., has recommended the purchase of fire apparatus to replace a worn unit.

Prescott, Ariz., to Buy Apparatus—Prescott, Ariz., has voted to purchase a quadruple fire apparatus. The city is also trying to extend its fire alarm system

Ex-Chief of Menasha, Wis., Dead—Joseph H. Mueller, Chief of the Menasha, Wis., Fire Department for twenty years, died at his home following a stroke.

Harvard, Ill., Receives Apparatus—Harvard, Ill., has received its new fire apparatus, purchased through subscriptions from farmers and farm organizations.

Fort Worth Holds Open House—Firemen of Fort Worth, Tex., held an open house in honor of the opening of their new fire station.

Ex-Chief of Rockville Center, N. Y., Dead—Harry J. Bullock who was Chief in Rockville Center, N. Y., from 1927 to 1929, died of heart disease.

Arlington, N. Y., Orders Apparatus—Without inviting bids, Arlington, N. Y., placed an order for an Ahrens-Fox 750-gallon pumper and an Ahrens-Fox ladder truck.

Ramona, Cal., to Erect Fire Station—A site has been purchased in Ramona, Cal., on which will be erected a fire station.

Cresco, Ia., Farmers Buy Apparatus—Farmers in the vicinity of Cresco, Ia., have purchased apparatus for the protection of rural property.

Seattle to Erect Fire Station—Plans are being prepared for a fire station to be erected in Seattle, Wash., at a cost of $34,000.

Scandinavia, Wis., Has New Apparatus—Boyer fire apparatus has been delivered to Scandinavia, Wis. The pump has a capacity of 300 g.p.m.

Salem, Ore., to Buy Pumper—Salem, Ore., has invited bids for the purchase of a 750-gallon pumper. Alternate bids for a 1,000-gallon pumper were also called for.

Smethport, Pa., Buys Pumper—Smethport, Pa., has purchased a Buffalo pumper equipped with a 500-gallon Hale pump. Delivery is expected sometime in May.

Ashland, O., Considers Fire Alarm—The Council of Ashland, Ohio, is considering the possibility of a new fire alarm system. Some time ago local business men signed a petition for better fire protection.

Two Departments May be Consolidated—In order to better fire protection facilities, plans are being made for the consolidation of the Fire Departments of Crockett and Valona, Cal.

Fire Wrecks Bluecher Palace in Berlin—The famous Bluecher Palace on Unter den Linden, Berlin, Germany, which was recently purchased by the United States for its embassy, was almost completely destroyed by a night fire.

Elmira, N. Y., Adopts Red Lights—Elmira, N. Y., is using red headlights on fire apparatus. Chief John Espey said that often motorists heard the sirens but could not distinguish fire apparatus from other cars at night.

Former Cincinnati Chief Honored—Henry C. Bunker, retired head of the Fire Department, was honored by a dinner arranged by his immediate family at the Hotel Alms. It marked his seventy-fifth birthday.

Lorain, O., Wants More Apparatus—Chief David E. Hatt and members of the Council, Lorain, Ohio, are trying to secure the purchase of new fire apparatus for the east section of the city.

Lahaska, Pa., May Have Fire Company—A meeting has been called in Lahaska, Pa., to consider the formation of a fire company to protect Lahaska and parts of the surrounding territory.

Alhambra, Cal., to Have New House—A new fire station will be erected in Alhambra, Cal., at a cost of $12,500. The station will have a hose drying tower and a drill tower. The exterior of the house will be along Moorish lines.

Large Crowd Expected at Washington Convention—A large number of firemen are expected to attend the convention of the Washington State Firemen's Association that will be held in Port Angeles, Wash., July 17-19.

Manilla, Ia., Has New Apparatus—Manilla, Ia., has received its community fire apparatus for use in answering rural fire alarms. Many farmers contributed towards the purchase.

Chief of Stevens Point, Wis., Resigns—Chief Herman Krembs, for many years Chief of Stevens Point, Wis., has retired on a pension and Assistant Chief Charles Leahy has been named head of the department.

Fire House Opened in Pasadena, Cal.—The Linda Vista fire house has been opened in Pasadena, Cal. It houses Engine Company No. 8. The Station was designed along Spanish lines and has comfortable living quarters for the firemen.

Fire House Opened in Bronx, N. Y.—Fire Commissioner John J. Dorman, New York Fire Department, opened a new fire station in the Bronx section of New York City. The building will house Engine Company No. 97 and Ladder Company No. 32.

Tulsa to Have New Fire Alarm Headquarters—Plans are under way for a new fire alarm headquarters to be erected in Tulsa, Okla. The city will be in the market for additional boxes, but the number will not be known until the plans have been completed.

Iowa Firemen to Meet in Ames—The Iowa Short Course for Firemen will be held at the Iowa State College May 19-22 under the auspices of the Engineering Extension Service of the college. Last year more than three hundred firemen attended the special course.

Custom Warehouse Destroyed in Paris—Three large warehouses of the freight depots at the Gared es Batignolles, where all goods shipped through Le Havre and Cherbourg from America are held for French customs, were destroyed by fire. Every company in Paris was called to fight the blaze. The loss was estimated at several million dollars.

Lieutenant of Albany, N. Y., Killed—Lieutenant Patterson, of Albany, N. Y., died as the result of injuries received when Pumper No. 4 collided with a trolley car. He was on the road to recovery and then several blood vessels burst. Fifty-two firemen volunteered for blood transfusions. The accident occurred February 15.

Utica, N. Y., Firemen May Test Cars—According to tentative plans, the fire houses of Utica, N. Y., may be used during the Safety Week for testing headlights, brakes and steering mechanism of automobiles. Fifteen cents is to be charged for the tests and part of the receipts will be given to the Firemen's Fund.

Duluth, Minn., May Answer Outside Calls—Duluth, Minn., is considering a plan of answering fire calls to townships outside the city limits, providing the townships reimburse the city for the service. Under the proposed arrangement, the township would pay $5 for each officer required and $4 for each fireman, and twenty per cent of this payroll for the use of the equipment.

Lakewood Receives Grand Prize—A large group of members of the Lakewood, Ohio, Chamber of Commerce, left by motor bus for Atlantic City, N. J., to receive the Grand Prize Award in the Inter-Chamber Fire Waste Contest that is conducted each year by the United States Chamber of Commerce. The per capita loss in Lakewood was twenty-six cents as compared with the 1929 figure of ninety-three cents.

PROPOSED IMPROVEMENTS

Tallulah, La.—Mayor D. H. Allen to take steps toward calling an election to vote on a bond issue or purchase of new piece of fire apparatus.

Freeport, N. Y.—Reports state village board approved a $60,000 bond issue for erection of fire station for Hose Co. 4 and other equipment in the fire department.

Cheyenne, Wyo.—Site being sought for purchase of new piece of fire Bonds to be voted on to finance project. F. M. Howard, City Clerk.

Westport, Conn.—Reports state Board of Finance recommended appropriation of $18,500 for erection of new Vigilant Fire Dept.'s fire house. Francis P. Dunnigan, Chief.

Bexley, Ohio—Petitions have been presented to village council requestion erection of fire station. Stephen Ludwig, Mayor.

Temple, Tex.—City Commission endorsed plans for new central fire station, according to reports.

Appalachia, Va.—Appalachia Fire Dept. raising funds for additional equipment, according to reports.

New York City, N. Y.—Committee of Whole of Board of Estimate authorized installation of modern underground fire alarm system in Middle Village and Ridgewood, Queens County.

Ogdensburg, N. Y.—Reports state city interested in purchase of new fire truck.

For Sale

Diesel engine, solid injection type, four cylinder, 60 hp., 800 rpm. Complete with gasoline engine type starter suitable for standby or continuous duty pumping. Engine brand new, run less than 50 hours. Cost $3,000, will sell for half. Address: Waukesha Motor Company, Waukesha, Wisconsin.
4-29, 5-13-27, 6-10-24, 7-8

Position Wanted

Salesman, age 37, married, over eight years experience selling fire apparatus and hose, desires position anywhere in United States or any other country, but preferably southwestern states. Address: Box 395, c/o FIRE ENGINEERING, 24 West 40th St., New York City.
5-13, 27

CONVENTION DATES

May 11-16—NATIONAL FIRE PROTECTION ASSOCIATION. 35th Annual Meeting, Toronto, Ont., Can. Managing Director, Franklin H. Wentworth, 60 Batterymarch St., Boston, Mass.

May 13—DEL-MAR-VA VOLUNTEER FIREMEN'S ASSOCIATION. 2nd Annual Convention, Smyrna, Del. Secretary, J. Emory Parks, Cambridge, Md.

May 18-20—FLORIDA STATE FIREMEN'S ASSOCIATION. 6th Annual Convention, Jacksonville Beach, Fla. Secretary, P. F. Pfaender, Winter Haven, Fla.

May 19-22—IOWA SHORT COURSE FOR FIREMEN. 7th Annual Short Course, Iowa State College, Ames, Ia. Address, Lindon J. Murphy, Municipal Engineer, Engineering Extension Service. Iowa City, Ia.

May 21—FIRE CHIEFS' EMERGENCY PLAN OF WESTCHESTER COUNTY—2nd Annual Dinner, Elks' Lodge, 58 Hamilton Ave., White Plains, N. Y. Secretary-treasurer, E. Riviere, Fire Department, Larchmont, N. Y.

May 21—IOWA STATE FIRE CHIEFS' ASSOCIATION. Annual Convention, Ames, Iowa. Secretary-Treasurer, Chief L. R. Morris, Ames, Ia.

May 23—NEW JERSEY STATE FIRE CHIEFS' ASSOCIATION. Quarterly Meeting, Madison, N. J. Secretary, Fred A. Trowbridge, 17 South Street, Morristown, N. J.

May 24—NORTHERN CALIFORNIA FIREMEN'S ASSOCIATION. Quarterly Meeting, Oroville, Cal.

May 25-27—OKLAHOMA STATE FIREMEN'S ASSOCIATION. 37th Annual Convention, Oklahoma City, Okla. Secretary-Treasurer Charles Slemp, 820 East 19th Street, Oklahoma City.

June 2-4—NORTHERN NEW YORK VOLUNTEER FIREMEN'S ASSOCIATION. Annual Convention, Tupper Lake, N. Y. Address, Charles Hayes, 116 Benedict Ave., Watertown, N. Y.

June 3-5—NEW MEXICO STATE FIREMEN'S ASSOCIATION. 9th Annual Convention (Combined with Firemen's Short Course), Clovis, N. M. Secretary-Treasurer, Theodore A. Rosenwald, Albuquerque, N. M.

June 6-7—SOUTHERN CALIFORNIA FIRE CHIEFS' CLUB. Next Meeting, Lompoc, Cal. Secretary-Treasurer, Charles E. Smith, Chula Vista, Cal.

June 8-9—SOUTH CAROLINA STATE FIREMEN'S ASSOCIATION. 26th Annual Convention, Aiken, S. C. (Tentative date.) Secretary, R. S. Hood, Sumter, S. C.

June 8-10—KANSAS STATE ASSOCIATION OF FIRE CHIEFS and KANSAS STATE FIREMEN'S ASSOCIATION. 15th and 44th Annual Convention, respectively, Topeka, Kan. Also 3rd Annual Fire College and 6th Annual Convention, Women's Auxiliary. Secretary, Chief K. D. Doyle, Wamego, Tex. Chairman, Fire School Committee, E. J. Stewart.

June 9—NORTHWEST ARKANSAS FIREMEN'S ASSOCIATION. Next Convention, Springdale, Ark. Secretary-Treasurer, F. B. Brock, Bentonville, Ark.

June 9-10—MINNESOTA STATE FIRE DEPARTMENT ASSOCIATION. 59th Annual Convention, Owatonna, Minn.; also June 8 Annual Convention, the Minnesota, Volunteer Firemen's Benefit Association, same place. Secretary, Fred Pfaender, New Ulm, Minn.

June 9-11—NEW YORK STATE ASSOCIATION OF FIRE CHIEFS. 25th Annual Convention, Hotel Queensbury, Glens Falls, N. Y. Secretary, Chief J. H. Golden, Fire Department, Cohoes, N. Y.

June 9-11—TEXAS STATE FIREMEN'S ASSOCIATION, 55th Annual Convention, Bryan, Tex. Secretary, Olin Culberson, Edna, Tex.

June 9-12—OHIO FIRE CHIEFS' ASSOCIATION. 14th Annual Convention, Akron, Ohio. Secretary, Chief Philip J. Harty, Youngstown Sheet & Tube Company, Youngstown, Ohio.

June 10-12—FLORIDA FIRE COLLEGE. 2nd Florida Fire College, Sebring, Fla. Address, Florida State Firemen's Association Fire College Committee, Chief Anderson, Ft. Myers, Fla., Chairman.

June 11-13—ARIZONA STATE FIREMEN'S ASSOCIATION. 8th Annual Convention, Flagstaff, Ariz. Secretary-Treasurer, H. W. Reggin, P. O. Box 813, Prescott, Ariz.

June 11-13—DELAWARE COUNTY FIREMEN'S ASSOCIATION. 25th Annual Convention, and Parade, Upper Darby, Pa. Financial Secretary, William E. Wunderlich, Lansdowne, Pa.

June 16-18—HUDSON VALLEY VOLUNTEER FIREMEN'S ASSOCIATION. 42nd Annual Convention, Schuylersville, N. Y. Secretary, Chief Chris W. Noll, Poughkeepsie, N. Y.

June 17—NORTHWESTERN OHIO VOLUNTEER FIREMEN'S ASSOCIATION. 59th Annual Convention, Port Clinton, Ohio. General Chairman of Convention, Harry Smith, Supt. Water Works, Port Clinton.

June 17-18—MARITME FIRE CHIEFS' ASSOCIATION. 16th Annual Convention, St. Stephen, Charlotte County, New Brunswick, Can. Secretary-Treasurer, Capt. Kenneth J. McRae, Puggsley Bldg., Saint John, N. B.

June 17-20—WASHINGTON STATE FIREMEN'S ASSOCIATION. 9th Annual Convention, Port Angeles, Wash. Secretary, S. H. Jenkins, Bellingham, Wash.

June 19-20—EASTERN ASSOCIATION OF FIRE CHIEFS. 4th Annual Convention, Madison Hotel, Atlantic City, N. J. Secretary, Ex-Chief F. E. Soule, Coatesville, Pa.

JUNE 23-24—SOUTHEASTERN ASSOCIATION OF FIRE CHIEFS. 4th Annual Meeting, Athens, Ga. Secretary, John L. Miller, Concord, N. C.

June 23-26—FIRE COLLEGE OF ILLINOIS FIREMEN'S ASSOCIATION. 7th Annual Fire College, University of Illinois, Urbana, Ill. For information, Prof. I. H. Provine, Dept. of Agriculture, University, or Chief R. W. Aslip, Secretary, Illinois Firemen's Association, Champaign.

June 23-26—NEW ENGLAND ASSOCIATION OF FIRE CHIEFS. 9th Annual Convention, Copley-Plaza Hotel, Boston, Mass. Meetings, Paul Revere Hall, Mechanics' Bldg., Huntington Ave., and Exhibits, Grand Hall, Same Bldg. Secretary, Chief John W. O'Hearn, 99 Main St., Watertown, Mass.; Chairman Exhibits, Chief Daniel B. Tierney, Arlington, Mass.; Traffic Manager, George F. Cobb, 744 Albany St., Boston.

June 24—NASSAU COUNTY FIREMEN'S ASSOCIATION. 26th Anniversary Parade and Tournament, Great Neck, L. I., N. Y. Secretary, J. W. Lane. Chairman, Tournament Committee, Chief Henry N. Buck, Westbury, N. Y.

July 8-9—DELAWARE VOLUNTEER FIREMEN'S ASSOCIATION. 11th Annual Convention, and Parade, Dover, Del. Secretary, Sam H. Carson, Dover, Del.

July 13-16—MICHIGAN STATE FIREMEN'S ASSOCIATION. 57th Annual Convention, and 3rd Annual Fire College. Secretary-Treasurer, H. L. Williams, Luddington, Mich.

July 13-16—MONTANA STATE FIREMEN'S ASSOCIATION. 40th Annual Convention and Firemen's Short Course, Bozeman, Mont. Secretary-Treasurer, D. E. Moser, Bozeman.

July 22-23—CENTRAL NEW YORK FIREMEN'S ASSOCIATION. 38th Annual Convention, Endicott, N. Y. Secretary, T. J. Murray, Cortland, N. Y.

July 31-Aug. 3—ONTARIO VOLUNTEER FIREMEN'S ASSOCIATION. Annual Convention, Dundas, Ont., Can. Secretary, W. J. Armstrong, 282 Indian Grove Ave., Toronto, 9 Ont.

Aug. 3-6—COLORADO STATE FIREMEN'S ASSOCIATION. 15th Annual Convention, Tournament and Fire College, Grand Junction, Col., Secretary, Clinton Turnbull, 303 Jacobson Bldg., Denver, Col.

Aug. 4-6—WISCONSIN PAID FIREMEN'S ASSOCIATION. 24th Annual Convention, Oconto, Wis., Secretary-Treasurer, William Schultz, Sheboygan, Wis.

Aug. 4-7—DOMINION ASSOCIATION OF FIRE CHIEFS. 23rd Annual Convention, Shawinigan Falls, P. Q., Can. Secretary, Chief James Armstrong, Kingston, Ont., Can. Exhibits, Chief R. N. O. Harrington, 4,000 Marlowe Ave., Notre Dame de Grace, Montreal.

Aug. 5-7—CALIFORNIA STATE FIREMEN'S ASSOCIATION. 9th Annual Convention, Santa Rosa, Cal. Secretary-Treasurer, H. E. Strasser, 1171 Tenth St., San Diego, Cal. Chairman, Convention Committee, Chief William H. Muenter, Santa Rosa, Cal.

Aug. 11-13—INDIANA FIREMEN'S ASSOCIATION. 14th Annual Convention. Evansville, Ind. Secretary, Clem Smith, P. O. Box 520, Terre Haute, Ind.

Aug. 18-21—FIREMEN'S ASSOCIATION OF THE STATE OF NEW YORK. 59th Annual Convention, Troy, N. Y. Secretary, Fred A. Davis, Fort Edward, N. Y.

Aug. 21-22—CONNECTICUT STATE FIREMEN'S ASSOCIATION. 48th Annual Convention, Cameo Theater, Campbell Ave., West Haven, Conn. Secretary, D. W. Harford, 10 Chestnut Street, So. Norwalk, Conn.

Sept. 1-3—KENTUCKY FIREMEN'S ASSOCIATION. 12th Annual Convention, Louisville, Ky. Secretary, Captain S. G. Render, Fire Department, Louisville, Ky.

Sept. 3-4—WISCONSIN STATE FIRE CHIEFS' ASSOCIATION. 2nd Annual Convention, Portage, Wis. Secretary, Chief A. J. Rahn, Two Rivers, Wis.

Sept. 8-10—ILLINOIS FIREMEN'S ASSOCIATION. 44th Annual Convention, Murphysboro, Ill. Secretary, Assistant Chief Roy W. Alsip, Champaign, Ill. Exhibit information, Chief Albert Herring, Murphysboro. Also, 1st Annual Convention, Ladies' Auxiliary of Illinois Firemen's Association. Secretary, Mrs. R. W. Alsip, Champaign.

Sept. 15-16—IOWA FIREMEN'S ASSOCIATION and IOWA FIREMEN'S FUNERAL AID ASSOCIATION. 54th Annual Convention, Audubon, Ia. Secretary, Paul A. Soener, Independence, Ia.

Sept. 19-23—PACIFIC COAST ASSOCIATION OF FIRE CHIEFS. 38th Annual Convention, Royal Hawaiian Hotel, Honolulu, T. H. Secretary, Jay W. Stevens, 1014 Merchants Exchange Bldg., San Francisco, Cal.

Sept. 22-24—MASSACHUSETTS STATE FREMEN'S ASSOCIATION. 52nd Annual Convention, Lynn, Mass. (Sessions at New Ocean House, Swampscott). Secretary, Daniel J. Looney, Room 1043, Old South Bldg., Boston, Mass.

Oct. 6-8—FIREMEN'S ASSOCIATION OF THE STATE OF PENNSYLVANIA. 52nd Annual Convention, Wilkes-Barre, Pa. Secretary, Charles E. Clark, 411 Bellevue Ave., Wayne, Pa.

Oct. 14-17—INTERNATIONAL ASSOCIATION OF FIRE CHIEFS. 59th Annual Convention, Plaza Hotel, Havana, Cuba. Meeting Hall, Asturiano Club. Recording Secretary, Chief James J. Mulcahey, Yonkers, N. Y.: Executive Secretary, Jay W. Stevens, 1014 Merchants' Exchange Bldg., San Francisco, Cal.; Chairman, Exhibit Committee, Chief Charles A. McGinley, East Orange, N. J.

Oct. 20-22—NEBRASKA STATE VOLUNTEER FIREMEN'S ASSOCIATION. 50th Annual Convention, Norfolk, Neb. Secretary-Treasurer, H. A. Webbert, Kearney, Neb.

Oct. 20-22—RAILWAY FIRE PROTECTION ASSOCIATION. 18th Annual Meeting, Cleveland, Ohio, Secretary-Treasurer, R. R. Hackett, Baltimore & Ohio Railroad, Baltimore, Md.

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New York Chicago Tulsa

FALSE ALARMS

VERY DRY

One of the large army of men who are called "nuts" by their wives but who are otherwise known as fire fans or buffs, was motoring through the west. For many miles he had been fighting the choking dust. He stopped at a fire station to inquire about road conditions and to again enjoy the sight of a fire engine.

"Doesn't it ever rain here in this country?" he asked.

"Rain?" questioned the man at the station. "Why there's frogs in this town over five years old that hain't learned to swim yet."

When a motorist of this age stops, looks and listens, there's usually something wrong with his engine.

HE WON

If you want to see a picture of man at his best, watch a group of hungry firemen when they sit down for their cooperative meal at the station.

One kind soul in the neighborhood went fishing and having caught more than his family could use, he gave enough to the firemen for a meal. One plate of fried fish was set before Kelly and MacGregor. Kelly helped himself to the larger one and the other remonstrated.

"Fine manners, you have, Kelly. If I had reached out first I'd have taken the smaller fish."

"Well," said Kelly, "you got it, didn't you?"

Said the hostess: "These are the first biscuits I ever baked. Take your pick."

A WET JOKE

Upstairs in the recreation room the boys were playing cards. From this room there was a door leading to the corridor from which opened offices of the department heads. A fireman walking through the room shouted to one of the players near the door:

"Hey open the door, will you?"

Not thinking, the player did.

"What's the big idea?" he asked. "Why couldn't you open it yourself?"

"Because the paint on the door is not dry yet," was the pleasant response.

Physicians advise people to get out in the sunshine. And landlords force them to.

A NECESSITY

A kind old lady was quite profuse with her thanks as she sat down in the street car.

"Thank you for your seat, young man," she said.

"Oh that's all right. I joined the Fire Department last night, and I'd rather stand anyway."

Some girls are so dumb they have to count on their fingers, while others count on their legs.

EFFORT WASTED

The Commisioner of Public Safety was making a tour of the city buildings. He called at the fire station and was not long in finding something to criticize.

"That loose grating is a menace to safety! Why don't you have a warning posted up?" he remarked to a fireman.

"Well, we did have one, Commissioner, but nobody ever fell down, so we decided it was unnecessary."

Some men like a girl beautiful but dumb—beautiful enough to please him and dumb enough to like him.

LESSER EVIL

For many months the town has been bothered by motorists who disputed the Fire Department's right of way. In order to clarify the situation, the police were instructed to bring all traffic violators to court. The day following there was a long line-up.

"Why didn't you obey the traffic officer's order?" bellowed the magistrate to the first offender brought before him.

"Well, my wife told me to go ahead," said the man meekly, "and I —"

"Well, why didn't you do as the officer said? Never mind what your wife said."

"But you see, sir, I don't have to live with the policeman."

"How come you always smoke quarter cigars?"

"Some one else always smokes the other three quarters."

HEADSTART

The George Washington Company, the Young America—in fact all of the fire companies in the township participated in the Memorial Day parade. All the volunteer firemen were attired in their dress uniforms. One of the boys after the parade, rushed to the appointed street corner where he was to meet his sweetheart. She was frowning.

"What's the matter? Didn't I do all right in the parade?"

"Sure you did all right," she answered sweetly. "Didn't you win it by half a yard?"

NO COMPETITION

At the training school, a very caustic instructor was showing the men, by means of blackboard sketches, the value of large diameter fire hose. Some one in the room attempted to supplement the information given by pointing out some facts to the fellow sitting next to him. The instructor stopped talking, but the other kept on.

The instructor then said, "I'll wait until that fellow stops making a fool of himself, then I'll begin."

THANK YOU

Dear Chief:

Enclosed please find a check for $10,000 which I wish to contribute to your building fund. I have been a fire buff for years and I am very much interested in your department and am showing my interest by this slight contribution.

As I wish to remain an anonymous contributor, I am leaving the check unsigned as well as this letter.

TOO AUDIBLE

The rural fire department decided to construct its own fire apparatus, much against the advice of more experienced chiefs. A second-hand car on display was taken out on trial before the sale was consummated. But the car was returned before the trial period was over.

"What's the matter?" asked the dealer.

"Just this," said the driver, "every part of it makes a noise except the horn."

Drawing by "Art" Espey

Following the Leader

YOUR CATALOG PAGE

Fire Protection Equipment and Supplies

1 Acid Siphons.
2 Adaptors for Changing Hydrant Threads.
3 Acid Jars and Rings.
4 Aerial Ladders, Detachable.
5 Aerial Trucks.
6 Alarms, Siren, Electric.
7 Alarm Systems, Industrial.
8 Alarm Systems, Municipal Telegraphic.
9 Alarms, Thermostatic.
10 Asbestos Clothing.
11 Badges, Insignias, Buttons, etc.
12 Banner, Trumpets, etc.
13 Battery Jars.
14 Battery Zincs for Fire Alarm Batteries.
15 Bells, Firm Alarm, Municipal
16 Body Equipments.
17 Boxes, Gongs, Reels, Registers, Fire Alarm.
18 Brakes, Air.
19 Brake Linings.
20 Brooms, Fire.
21 Building Materials, Fire Retardant.
22 Caps, Firemen's.
23 Chains, Non-Skid Fire Apparatus.
24 Chassis for Fire Apparatus.
25 Chemical Engines and Tanks.
26 Chimney Fire Fusees & Compounds
27 City Service Trucks.
28 Coats & Suits, Firemen's Quick Hitch.
29 Combination Chemical & Hose Cars.
30 Cutting & Welding Equipment Blow Torch.
31 Cutting & Welding Equipment, Electric.
32 Deluge Sets.
33 Door Openers, Fire Station, Automatic.
34 Extinguishers, Calcium Chloride.
35 Extinguishers, Carbon Dioxide.
36 Extinguishers, Soda-Acid.
37 Extinguishers, Carbon Tetrachloride.
38 Extinguishers, Foam.
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40 Fire Boat Nozzle Equipment.
41 Fire Department Supplies, General.
42 Fire Exit Devices, Door Opening.
43 Fire Alarm Posts.
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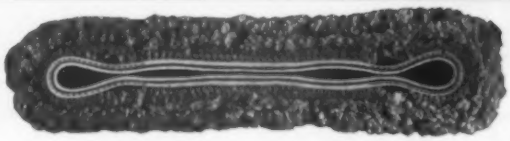
5-13



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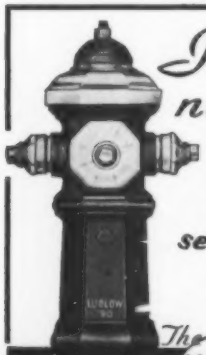

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ADVERTISING INDEX

ADVERTISING PAYS - - - - - IN FIRE ENGINEERING

	Page
American District Tele. Co.	361
American Rubber Mfg. Co.	370
Anderson Coupling & Fire Supply Co.	365
Bi-Lateral Fire Hose Co.	368
Boyer Fire Apparatus Co.	362
Braxmar Co., C. G.	365
Buckeye Iron & Brass Works	365
Buffalo Fire Appliance Corp.	362
Cairns & Brother	362
Century Tie Co.	365
Clay, Inc., John H.	362
Combination Ladder Co., Inc.	362
Darling Valve & Mfg. Co.	339
Decot Machine Works	368
Eddy Valve Co.	368
Everson-Ross Co.	370
Felco, Inc.	368
French & Hecht	Back Cover
Fulton Bag & Cotton Mills	361
Goodrich Rubber Co., B. F.	370
Hedberg, J. N.	368
Hewitt-Gutta Percha Rubber Corp.	362
INFORMATION FOR BUYERS	367
Kohler Company	341
Lally Fire Appliance Co.	365
Ludlow Valve Mfg. Co.	368
Maxim Motor Co.	362
National Foam System, Inc.	365
Northern Pump Co.	362
Rensselaer Valve Co.	368
Smith Mfg. Co., D. B.	341
Sterling Siren Fire Alarm Co., Inc.	Inside Front Cover
Waterous Company	370
Wood & Co., R. D.	361
Woodhouse Mfg. Co.	365

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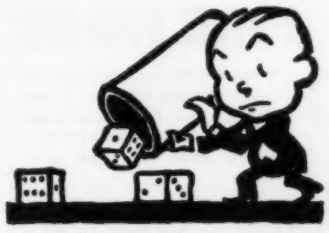

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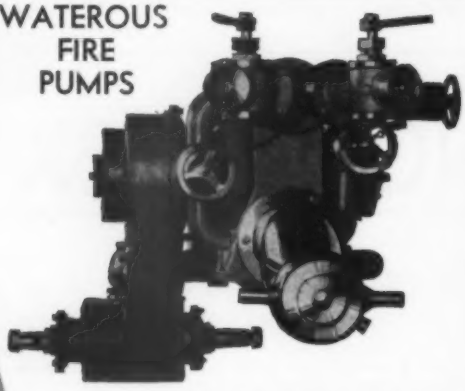

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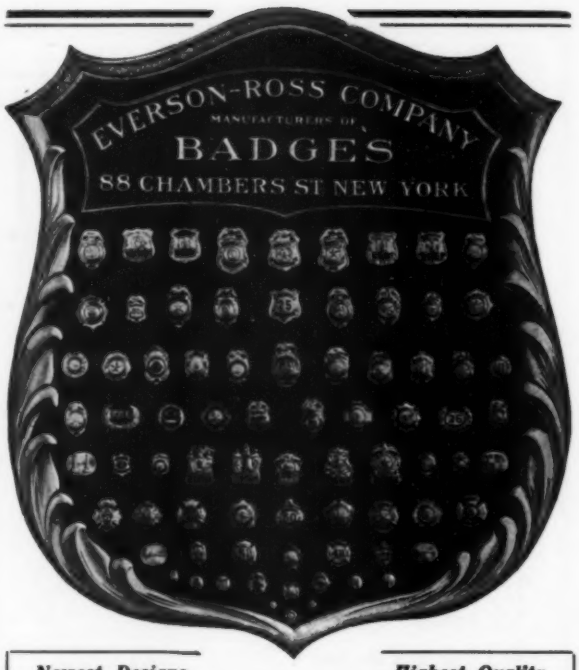

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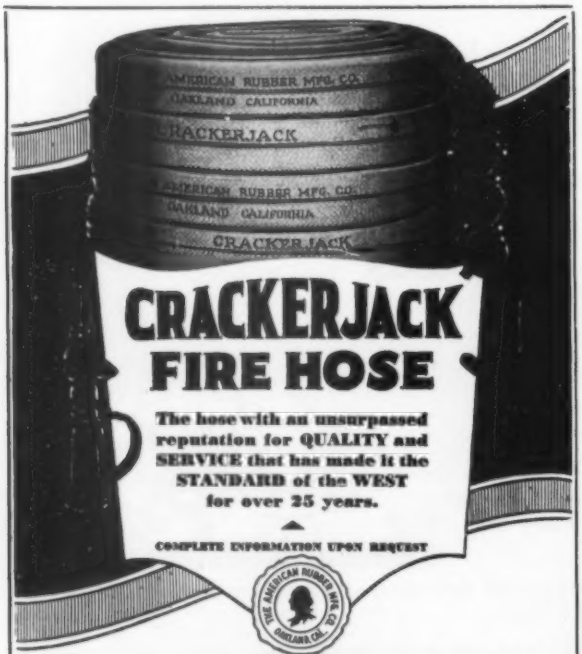

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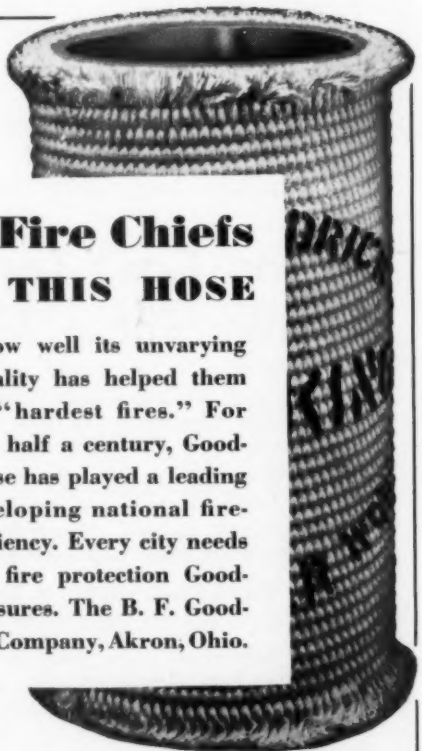

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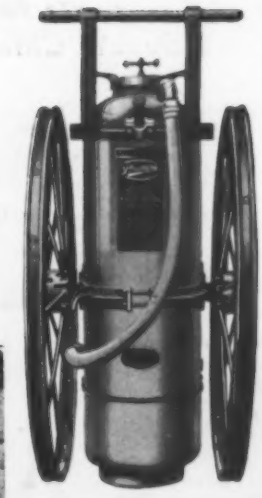

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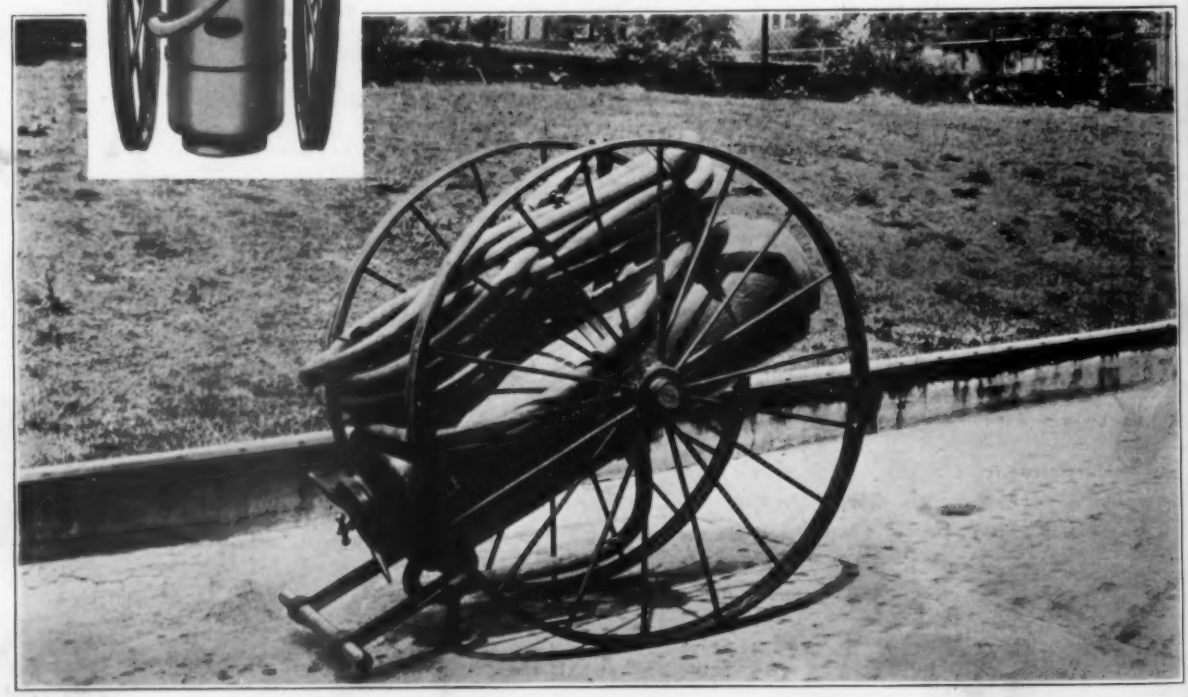

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